ROZ

MONTHLY REPORT • ECONOMIC AND FINANCIAL MARKET OUTLOOK FEBRUARY 2023



ECONOMIC & FINANCIAL ENVIRONMENT

FINANCIAL MARKETS
Energy: with 2022 behind us, will 2023
be as turbulent?

INTERNATIONAL ECONOMY Europe benefits from a relatively mild winter

PORTUGUESE ECONOMY Without the ECB, how will Portugal finance itself in 2023?

Portugal's macro scenario: key takeaways

SPANISH ECONOMY Spanish households' savings and financial wealth on the decline

DOSSIER: INFLATION SPECIAL: IS IT HERE TO STAY?

Will inflation come down? The key trends for 2023

What will happen to inflation in the long term? A global perspective

Inflation dynamics for Portugal in 2023

Imported inflation in Portugal: characterisation and recent performance





MONTHLY REPORT -ECONOMIC AND FINANCIAL MARKET OUTLOOK

February 2023

The Monthly Report is a publication developed jointly by CaixaBank Research and BPI Research (UEEF)

BPI Research (UEEF)

www.bancobpi.pt / http://www.bancobpi.pt/grupo-bpi/estudose-mercados/mercados-financeiros

Paula Carvalho

Chief Economist

CaixaBank Research

www.caixabankresearch.com research@caixabank.com

Enric Fernández

Chief Economist

José Ramón Díez

Head of International Economies

and Financial Markets

Oriol Aspachs

Head of Spanish Economy

Sandra Jódar

Head of Strategic Planning

Adrià Morron Salmeron and

Nuria Bustamante

Monthly Report coordinators

Javier Garcia-Arenas

Dossier coordinator

Date this issue was closed: 3 February 2023

INDEX

- 1 EDITORIAL
- 3 KEY POINTS OF THE MONTH
- 4 FORECASTS

7 FINANCIAL MARKETS

9 Energy: with 2022 behind us, will 2023 be as turbulent? Beatriz Villafranca

12 INTERNATIONAL ECONOMY

- 14 Europe benefits from a relatively mild winter
- 16 US: land as best you can

20 PORTUGUESE ECONOMY

- 23 Without the ECB, how will Portugal finance itself in 2023? Vânia Duarte
- 25 Portugal's macro scenario: key takeaways Teresa Gil Pinheiro

28 SPANISH ECONOMY

30 Spanish households' savings and financial wealth on the decline

33 DOSSIER: INFLATION SPECIAL: IS IT HERE TO STAY?

- 33 Will inflation come down? The key trends for 2023
- 35 What will happen to inflation in the long term? A global perspective
- 37 Inflation dynamics for Portugal in 2023
- 39 Imported inflation in Portugal: characterisation and recent performance



Financial Markets vs. Central Banks: A Different View?

Growth data for the last quarter of 2022 confirmed the expected sharp slowdown in global activity, due to the effects of rising energy prices and tighter monetary policy. However, this sharp downward adjustment of the economic cycle, far from triggering corrections in financial asset prices, is coinciding with near double-digit increases in stock markets since the beginning of the year and cumulative falls in long-term government bond yields of around 50 bps. The increase in risk appetite comes as investors anticipate that we are leaving behind the worst economic scenarios formulated after the summer (global stagflation), as imbalances between supply and demand are being addressed and inflationary pressures are gradually corrected.

The conclusion is that the hardest part of the central banks' work is behind them, with domestic demand already reflecting the effects of rising interest rates. The problem is that markets are already discounting an imminent change in monetary policy, perhaps prematurely, relying on a quick turnaround in the most important components of consumer price baskets. The easing of financial conditions triggered by this "risk on" movement does not help the monetary authorities in their current fight against inflation, however. Policy communication is trying, with little success, to curb these expectations of a turnaround in interest rates (as evidenced by the historic daily fall in yields in Europe after the last 50 bp increase in official rates). Central bankers want to avoid a spike in financial instability in the event of further price surprises.

This game between investors and central banks will determine the behaviour of financial assets in 2023, in an economic context still subject to high volatility and uncertainty. Especially when, in addition to the already known risks (inflation, war in Ukraine and China), we consider other new risk appearing on the horizon, such as the US debt ceiling or the effects that changes in Japan's monetary policy may have on Japanese investors' positions in international bonds. It therefore seems too premature to buy into a soft-landing scenario that would allow central banks to quickly reduce interest rates and keep the financial market trends from earlier in the year intact.

On the positive side, the favourable (and unexpected) wealth effect of the first weeks of the year is combined with the strength shown by most labour markets (53-year lows in the US unemployment rate), the strength of private sector balance sheets (with significant savings still accumulated by households in the US and China), the improvement in household and business expectations since November and, above all, a good performance in the energy markets in recent months. All this translates into a widespread, upward revision of activity forecasts, when we all thought that this winter could lead to just the opposite. In our case, we have increased the average growth forecast for the eurozone in 2023 from 0.2% to 0.5%, which implies improvements for such important countries as Germany (from -0.2% to 0%), Italy (from -0.2% to 0.5%) or Spain (from 1% to 1.3%). In this way, we are moving away from scenarios of job destruction, although the forecasts continue to be subject to a high degree of unpredictability, reflecting the fact that we are in a year of transition in which the conditions for a return to a certain degree of normality from 2024 onwards must be established. We are, therefore, changing the forecasts, but not the narrative, as we will continue to face a very complex scenario in the short term, with more questions than answers about the changes that the economic environment is facing. And while the improvement in investor sentiment is to be welcomed, it will only be supported by a downward adjustment in inflation that spreads to most components of the basket, something for which we will certainly need time and patience.



Chronology

JANUARY 2023

- 1 Croatia joins the euro area and the Schengen Area.
- 8 China reopens its borders to foreign travellers after three years.

NOVEMBER 2022

- 2 The Fed raises official interest rates by 75 bps.
- 15 The world's population reaches 8 billion people.

SEPTEMBER 2022

- 8 Queen Elizabeth II dies after a 70-year reign.
- **16** The death of Mahsa Amini sparks a wave of mass protests in Iran.
- 27 Sabotage on the Nord Stream 1 and 2 gas pipelines.
- 30 The European Council approves measures to reduce energy demand.

DECEMBER 2022

- 14 The Fed raises official interest rates by 50 bps.
- 15 The ECB raises official interest rates by 50 bps and announces that it will reduce reinvestments under the APP.

OCTOBER 2022

- **5** OPEC agrees to cut crude oil production by 2 million barrels a day compared to August 2022 levels.
- 23 Xi Jinping receives a third term as general secretary of the Chinese Communist Party.
- 27 The ECB raises official interest rates by 75 bps.

AUGUST 2022

Summer 2022 Heat waves and drought in Europe and other countries around the world.Summer 2022 Disruptions in the supply of Russian energy to Europe.

31 Mikhail Gorbachev, the last president of the USSR, dies.

Agenda

FEBRUARY 2023

- 2 Spain: registration with Social Security and registered unemployment (January).
- Governing Council of the European Central Bank meeting.
- 8 Portugal: employment and unemployment (Q4).
- **9** Portugal: turnover in industry and services (December).
- **10** Portugal: labour costs (February).
- 14 Japan: GDP (Q4).
- 16 Spain: foreign trade (December).
- 24 Spain: loans, deposits and NPL ratio (December).
- 27 Euro area: economic sentiment index (February).
- 28 Spain: CPI flash estimate (February).
 Spain: balance of payments (December).
 Portugal: GDP breakdown (Q4).
 Portugal: CPI flash estimate (February).

MARCH 2023

- 2 Spain: registration with Social Security and registered unemployment (February).Euro area: CPI flash estimate (February).
- 10 Portugal: S&P rating.
- 16 Spain: quarterly labour cost survey (Q4). Portugal: industrial production prices (February). Governing Council of the European Central Bank meeting.
- 17 Spain: S&P rating.
- **21-22** Federal Open Market Committee meeting.
- 22 Portugal: home prices (Q4).
- 23 Spain: loans, deposits and NPL ratio (Q4).
- 23-24 European Council meeting.
- 24 Spain: Q4 GDP (2nd estimate). Spain: balance of payments and NIIP (Q4). Portugal: general government key figures (2022).
- 30 Spain: CPI flash estimate (March). Euro area: economic sentiment index (March). Portugal: NPL ratio.
- 31 Spain: household savings rate (Q4).
 Spain: state budget execution (February).
 Portugal: CPI flash estimate (March).



The factors conditioning Portugal's growth in 2023

Like other European economies, the Portuguese economy continues to face an adverse environment marked by geopolitical uncertainty, high inflation and rising interest rates, all of which limits its capacity for growth. Nonetheless, over recent months Portugal has been able to weather this adversity better than expected. Moreover, the recent moderation in energy prices suggests that the recovery may be somewhat more dynamic than initially expected.

All this leads us to slightly improve the economic scenario forecast for this year, with GDP growth now at 1.0%, 0.5 p.p. above the previous projection, as explained in more detail in the article «The keys to the macro scenario in Portugal» in this issue. On the other hand, we put inflation at 5.5%, slightly below the 5.8% previously forecast. Uncertainty remains very high and there are many factors that could change the course of the economy in the coming months, both negatively and positively. Among these, three stand out: The evolution of energy prices, the resilience of the labour market, and the implementation of the European NGEU funds.

As far as energy prices are concerned, the recent drop in gas and oil prices is noteworthy. Futures markets suggest that prices will remain at similar levels for the rest of the year. If this scenario is borne out, the main inflation rate will move away from last year's highs and, more importantly, the pressure on production costs will ease.

As detailed in the inflation brief included in this report, the spillover effects that typically follow an energy price shock are large and persistent. In Portugal, although current data does not suggest second-round effects, we expect to see continued upward pressure on food prices. On the other hand, the pass-through of higher production costs into final prices is gradual, so the underlying inflation rate will remain high this year. But the first step towards a slowdown in this process is a moderation in energy prices.

Containing inflationary pressures over the year will also make it easier for the ECB to stop raising interest rates in 2023. The combination of these two factors is of paramount importance for families to maintain their consumption and for companies to carry out their investment plans at a time of such significant economic transformation.

The second key to the forecast scenario is the resilience of the labour market. Up to the time of writing, the evolution of employment has been quite positive in terms of both the quantity of jobs created and their quality, with a reduction in the proportion of temporary contracts in the post-pandemic period. This has also helped to sustain consumption. Directly, because the income of Portuguese households as a whole increases when more people are employed; and also because when employment is created in the economy as a whole, the fears that everyone feels about losing their job are contained, something that is particularly relevant in the current difficult context. In previous crises, when unemployment tended to rise rapidly, households reacted by increasing their savings for precautionary reasons, which accentuated the weakening of consumption.

The labour market tends to react to changes in the macroe-conomic environment with some delay, so it is expected that the pace of job creation will slow down in the coming months. In this context, we anticipate that the unemployment rate will reach levels around 6.4% by 2023, slightly above the 6.0% observed in 2022. In fact, the labour shortage reported in several sectors and the fact that we do not anticipate a contraction of the economy will be factors supporting the Portuguese labour market.

Finally, it is also worth noting the importance that the implementation of the NGEU European funds is likely to have in the course of this year. Although the implementation of this programme has been slower than expected last year, we estimate that a recovery in the application of these funds to rates closer to those historically observed in other programmes could contribute around 0.3 p.p. to GDP growth in 2023.

As in other European economies, the implementation of NGEU funds should support the transformation process of the Portuguese economy, improving the digitalisation of companies and making the production process more environmentally friendly. In addition, it should contribute to improving the efficiency of public services, mainly by investing in the digitalisation and simplification of processes. Finally, by boosting the economy, it should facilitate further adjustment of public finances. This is particularly relevant this year as the ECB has announced that as of March it will reduce the holdings of government debt it has acquired in recent years under the APP programme.



Average for the last month in the period, unless otherwise specified

Financial markets

	Average 2000-2007	Average 2008-2019	2020	2021	2022	2023	2024
INTEREST RATES							
Dollar							
Fed funds (upper limit)	3.43	0.81	0.25	0.25	4.50	5.00	3.75
3-month Libor	3.62	1.01	0.23	0.21	4.74	4.75	3.50
12-month Libor	3.86	1.48	0.34	0.52	5.47	4.50	3.50
2-year government bonds	3.70	1.04	0.13	0.62	4.41	4.00	2.80
10-year government bonds	4.70	2.57	0.93	1.45	3.62	3.20	2.80
Euro							
ECB depo	2.05	0.20	-0.50	-0.50	1.77	3.50	2.50
ECB refi	3.05	0.75	0.00	0.00	2.27	4.00	3.00
€STR	_	-0.54	-0.56	-0.58	1.57	3.41	2.48
1-month Euribor	3.18	0.50	-0.56	-0.60	1.72	3.36	2.42
3-month Euribor	3.24	0.65	-0.54	-0.58	2.06	3.31	2.35
6-month Euribor	3.29	0.78	-0.52	-0.55	2.56	3.38	2.46
12-month Euribor	3.40	0.96	-0.50	-0.50	3.02	3.44	2.56
Germany							
2-year government bonds	3.41	0.35	-0.73	-0.69	2.37	3.20	2.50
10-year government bonds	4.31	1.54	-0.57	-0.31	2.13	3.00	2.80
Spain							
3-year government bonds	3.62	1.69	-0.57	-0.45	2.66	3.23	2.93
5-year government bonds	3.91	2.19	-0.41	-0.25	2.73	3.38	3.15
10-year government bonds	4.42	3.17	0.05	0.42	3.18	4.10	3.80
Risk premium	11	164	62	73	105	110	100
Portugal							
3-year government bonds	3.68	3.33	-0.61	-0.64	2.45	3.46	3.20
5-year government bonds	3.96	3.94	-0.45	-0.35	2.53	3.57	3.38
10-year government bonds	4.49	4.68	0.02	0.34	3.10	4.05	3.80
Risk premium	19	314	60	65	97	105	100
EXCHANGE RATES							
EUR/USD (dollars per euro)	1.13	1.26	1.22	1.13	1.06	1.10	1.15
EUR/GBP (pounds per euro)	0.66	0.84	0.90	0.85	0.87	0.86	0.85
OIL PRICE							
Brent (\$/barrel)	42.3	80.1	50.2	74.8	81.3	93.0	80.0
Brent (euros/barrel)	36.4	62.5	41.3	66.2	76.8	85.1	69.8

Forecasts



Change in the average for the year versus the prior year average (%), unless otherwise indicated

International economy

	Average 2000-2007	Average 2008-2019	2020	2021	2022	2023	2024
GDP GROWTH							
Global	4.5	3.3	-3.0	6.0	3.1	2.7	3.4
Developed countries	2.6	1.4	-4.4	5.2	2.6	1.0	1.7
United States	2.7	1.7	-2.8	5.9	2.1	0.9	1.4
Euro area	2.2	0.8	-6.3	5.3	3.5	0.5	1.6
Germany	1.6	1.2	-4.1	2.6	1.9	0.0	1.4
France	2.2	1.0	-7.9	6.8	2.6	0.3	1.4
Italy	1.5	-0.3	-9.1	6.7	3.9	0.5	1.1
Portugal	1.5	0.5	-8.3	5.5	6.7	1.0	2.1
Spain	3.7	0.6	-11.3	5.5	5.5	1.3	1.9
Japan	1.4	0.4	-4.5	2.1	1.2	1.3	1.1
United Kingdom	2.6	1.3	-11.0	7.6	3.9	-1.7	-0.9
Emerging and developing countries	6.5	4.9	-1.9	6.6	3.5	3.9	4.5
China	10.6	8.0	2.2	8.4	3.0	5.2	5.1
India	7.2	6.8	-6.7	9.0	7.3	6.0	6.7
Brazil	3.6	1.6	-3.3	5.0	1.8	0.9	1.8
Mexico	2.4	1.9	-8.0	4.7	1.9	1.4	2.5
Russia	7.2	1.3	-2.7	4.8	-8.1	-3.2	3.0
Turkey	5.5	4.5	1.9	11.4	3.1	3.0	3.2
Poland	4.2	3.7	-2.0	6.9	4.9	0.7	3.2
INFLATION							
Global	4.1	3.7	3.2	4.7	8.6	6.0	4.1
Developed countries	2.1	1.6	0.7	3.1	7.2	4.0	2.0
United States	2.8	1.8	1.2	4.7	8.0	4.1	2.7
Euro area	2.2	1.4	0.3	2.6	8.4	5.3	2.7
Germany	1.7	1.4	0.4	3.2	8.6	5.9	3.0
France	1.9	1.3	0.5	2.1	5.9	4.3	2.6
Italy	2.4	1.4	-0.1	1.9	8.7	5.9	2.6
Portugal	3.1	1.1	0.0	1.3	7.8	5.5	2.8
Spain	3.2	1.3	-0.3	3.1	8.4	4.2	2.6
Japan	-0.3	0.4	0.0	-0.2	2.5	2.3	0.9
United Kingdom	1.6	2.3	0.9	2.6	9.1	5.7	2.9
Emerging countries	6.7	5.6	5.1	5.9	9.7	7.4	5.6
China	1.7	2.6	2.5	0.9	2.0	1.5	1.6
India	4.5	7.3	6.6	5.1	6.7	5.3	5.0
Brazil	7.3	5.7	3.2	8.3	9.3	5.1	4.0
Mexico	5.2	4.2	3.4	5.7	7.9	4.7	3.8
Russia	14.2	7.9	3.4	6.7	13.8	7.5	6.8
Turkey	22.6	9.6	12.3	19.6	72.3	36.4	29.0
Poland	3.5	1.9	3.7	5.2	14.9	7.0	3.7

Forecasts



Change in the average for the year versus the prior year average (%), unless otherwise indicated

Portuguese economy

	Average 2000-2007	Average 2008-2019	2020	2021	2022	2023	2024
Macroeconomic aggregates							
Household consumption	1.7	0.5	-6.9	4.7	5.9	0.9	0.9
Government consumption	2.3	-0.3	0.4	4.6	2.1	1.0	1.0
Gross fixed capital formation	-0.4	-0.7	-2.2	8.7	1.3	2.5	8.2
Capital goods	3.2	2.6	-5.4	13.9	-	-	_
Construction	-1.5	-2.6	1.0	5.5	-	-	-
Domestic demand (vs. GDP Δ)	1.3	0.1	-5.3	5.8	4.5	1.1	2.3
Exports of goods and services	5.3	4.0	-18.8	13.5	17.1	4.3	6.1
Imports of goods and services	3.6	2.7	-11.8	13.3	10.8	4.5	6.3
Gross domestic product	1.5	0.5	-8.3	5.5	6.7	1.0	2.1
Other variables							
Employment	0.4	-0.5	-1.9	2.7	2.0	0.1	0.4
Unemployment rate (% of labour force)	6.1	11.4	7.0	6.6	6.0	6.4	6.1
Consumer price index	3.1	1.1	0.0	1.3	7.8	5.5	2.8
Current account balance (% GDP)	-9.2	-2.9	-1.2	-1.1	-1.5	-1.0	-0.3
External funding capacity/needs (% GDP)	-7.7	-1.6	0.1	0.6	-0.7	1.3	1.6
Fiscal balance (% GDP)	-4.6	-5.1	-5.8	-2.9	-1.1	-0.9	-0.8

Forecasts

Spanish economy

	Average 2000-2007	Average 2008-2019	2020	2021	2022	2023	2024
Macroeconomic aggregates							
Household consumption	3.6	0.0	-12.4	6.0	4.4	1.2	2.3
Government consumption	5.0	1.1	3.5	2.9	-0.9	1.0	0.5
Gross fixed capital formation	5.6	-1.4	-9.7	0.9	4.3	1.5	2.5
Capital goods	4.9	0.1	-13.3	6.3	3.8	0.4	3.3
Construction	5.7	-2.9	-10.2	-3.7	4.2	2.0	2.0
Domestic demand (vs. GDP Δ)	4.9	-0.3	-4.5	4.9	2.8	1.2	1.9
Exports of goods and services	4.7	2.9	-19.9	14.4	14.9	2.4	2.0
Imports of goods and services	7.0	0.2	-14.9	13.9	7.7	2.3	2.0
Gross domestic product	3.7	0.6	-11.3	5.5	5.5	1.3	1.9
Other variables							
Employment	3.2	-0.4	-6.8	6.6	3.8	1.1	1.4
Unemployment rate (% of labour force)	10.5	19.5	15.5	14.8	12.9	12.8	12.4
Consumer price index	3.2	1.3	-0.3	3.1	8.4	4.2	2.6
Unit labour costs	3.0	0.6	7.7	0.3	0.5	3.6	2.5
Current account balance (% GDP)	-5.9	-0.3	0.6	1.0	0.3	0.3	1.0
External funding capacity/needs (% GDP)	-5.2	0.1	1.1	1.9	1.5	1.5	2.0
Fiscal balance (% GDP) ¹	0.4	-6.5	-10.3	-6.9	-4.0	-4.0	-3.3

Note: 1. Excludes losses for assistance provided to financial institutions.

Forecasts



A good start to the year in the financial markets

Respite in the tightening of global financial conditions.

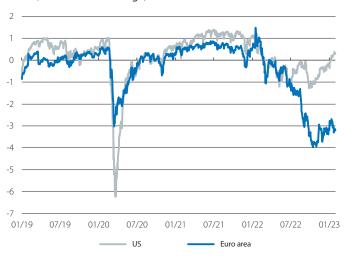
Investors welcomed the new year with a heightened appetite for risk, reducing the losses registered during a tumultuous 2022. Among the main reasons behind the optimism is the increased confidence among investors that the worst of the inflationary shock is probably behind us, mainly due to the improvement in the global bottlenecks and the stabilisation in the energy markets. These factors have materialised in a moderation in headline inflation in the major economies, despite greater persistence in the core components. In this context, investors are betting that the central banks will likely be able to complete their cycle of official rate hikes in the coming months and that, in turn, the process of monetary tightening will not lead to a global economic recession - or if it does, it would at least be a short and mild one. This optimism has been reflected in widespread gains in the fixedincome and equity markets, paving the way for a significant easing in the financial conditions indices and a some containment in the volatility metrics.

The central banks are keeping their course, with the ECB at the helm. The enthusiasm seen in the markets contrasts with the messages of the central banks, which have been firm in their rhetoric of continuing to tighten monetary policy. In this regard, at its meeting in early February the ECB once again announced a rise in official rates of 50 bps (placing the depo rate at 2.50% and the refi rate at 3.0%), while also indicating its intention to increase them at the same pace in March. It also confirmed the plan already announced in December for the gradual reduction in the bond portfolio under its asset purchase programme (APP) beginning in March (at an initial rate of €15 billion per month). The Federal Reserve, meanwhile, approved a 25-bp rise, placing rates in the 4.50%-4.75% range, and reiterated that additional adjustments will be needed, although it also signalled that the end of the cycle of rate hikes was in sight. In the money markets, investors are expecting both the ECB and the Fed to reach the peak in rates in the coming months, with cumulative increases of around 100 bps up to 3.5% in the euro area and of 25 bps up to the 4.75%-5.00% range in the US. Rate cuts are expected to begin this year in the case of the Fed and in early 2024 for the ECB.

The euro consolidates its position against the dollar. Other central banks also approved a new round of rate hikes, including the Bank of England (+50 bps up to 4.0%) and the Bank of Canada (+25 bps up to 4.5%). The latter surprised the markets by indicating that, in the absence of further shocks, it would not implement any further increases. The Bank of Japan, meanwhile, kept both official rates and the parameters of its yield curve control policy unchanged – announcements which contributed to a depreciation of the yen and a fall in sovereign debt yields. Meanwhile, in the context of a tightening of the hawkish narrative previously noted by the ECB, the euro consolidated its rally against the dollar

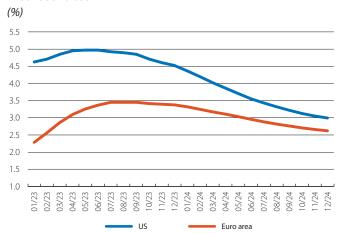
Financial conditions

Index (0 = historical average)



Source: BPI Research, based on data from Bloomberg

Expectations for Fed and ECB reference interest rates



Note: Forwards on the EFFR and the OIS of the euro area derived using market yield curves as of 31 January 2023

Source: BPI Research, based on data from Bloomberg.

Currencies: effective nominal exchange rates Index (100 = January 2022)



Source: BPI Research, based on data from Bloomberg.

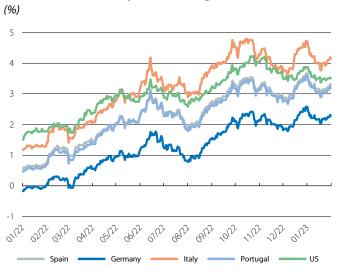
and traded near 1.10, the highest level since the spring of 2020. In contrast, the dollar weakened against most currencies, including those of both other advanced countries and the major emerging markets; in January, the dollar's nominal effective exchange rate weakened by 1%, following the depreciation of 9% already accumulated during Q4 2022.

The price of government paper also begins the year in the green. In the government bond market, sovereign yields declined in January by around 30 bps, both in Europe (the German 10-year bond stood at 2.3%) and in the US (3.5% in the case of the 10-year bond). However, sovereign yield curves have remained inverted in several sections in the main benchmark countries, serving as a warning of the risk of a possible recession. The risk premiums of the euro area periphery countries, meanwhile, went down (compared to Germany, by -10 bps in both Spain and Portugal) and for the time being they do not seem to reflect any substantial impact of the Quantitative Tightening plan announced by the ECB. Also, risk premiums have found support in the possibility of an agreement in the EU for the creation of a mechanism financed with EU debt to respond to the subsidies planned in the US (under the Inflation Reduction Act). Meanwhile, US Secretary of the Treasury Janet Yellen told Congress that the debt ceiling was reached on 19 January and, although there has been little reaction in the markets, warned that exceptional measures, some of which have already been put in place, could maintain the funding capacity until June.

Widespread gains in the international stock markets. Stock indices kick-started the year with cumulative gains in January of 6% in the US (S&P 500), 10% in Europe (Euro Stoxx 50) and 8% in the case of Emerging economies on aggregate. This is the best start to the year for the international stock markets since 2019, according to the global MSCI aggregate; in Europe, the advance is the most pronounced in a month of January in the last 40 years. The weak tone in corporate earnings forecasts during the Q4 2022 earnings season has been offset by the positive outlook for the global economy, the reopening process in China and the improvement in economic sentiment, most notably in Europe. In emerging markets, the advance in the stock markets also reflects the improvement in capital flows to these economies, as well as the aforementioned weakening of the dollar.

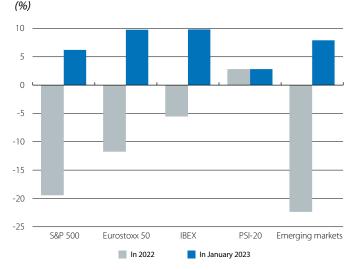
Stabilisation in commodity prices, except metals. In the commodity markets, the big surprise has been the correction in gas prices which, despite remaining at historically high levels, have stabilised at their lowest levels since Russia's invasion of Ukraine, dispelling the risks of a rationing of supplies (see the Focus «Energy: with 2022 behind us, will 2023 be as turbulent?» in this same report). The price of Brent oil, meanwhile, has fluctuated at around 85 dollars a barrel against a backdrop of upward revisions in the forecasts for demand, on the one hand, and a greater accumulation of reserves in the US, on the other. OPEC+ has also signalled that it is not planning any production cuts in the short term, in anticipation of the reopening process in China. This latter factor, however, has exerted upward pressure on industrial metal prices, while food prices have remained high.

Interest rates on 10-year sovereign debt



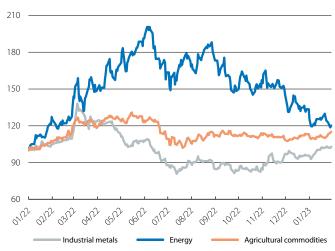
Source: BPI Research, based on data from Bloomberg

Change in the main stock market indices



Source: BPI Research, based on data from Bloomberg

Commodity prices Index (100 = January 2022)



Source: BPI Research, based on data from Bloomberg

Energy: with 2022 behind us, will 2023 be as turbulent?

In 2022, energy commodity prices fluctuated significantly. The war between Russia and Ukraine – key players in the supply of these commodities – triggered a sharp rise in crude oil and natural gas prices, especially in Europe. However, in recent months there has been a significant moderation in energy prices compared to the peaks observed last August. There are several factors that have contributed to this improvement. On the one hand, the high level of gas reserves reached in Europe, together with the effort of governments, industries and households to reduce consumption, as well as a milder winter than usual, have helped European gas prices (the Dutch TTF) to fall by more than 80% since the summer. On the other hand, the oil price has stabilised in the face of a moderate growth outlook in China.

With all this, both the futures prices and the forecasts of most analysts in the sector reflect expectations that energy prices in the next 12 months are likely to be more favourable for economic growth. With this in mind, and together with the relative improvement in investor sentiment regarding these commodities, we have revised our forecasts for European oil and gas prices for the coming quarters.

China's reopening will be key for oil

The moderation in industrial activity worldwide and a milder than usual winter in Europe contributed to a decline of one million barrels a day (b/d) in the demand for crude oil in Q4 2022. During this period, and despite the reduction in supply from OPEC and its allies, there was a surplus in crude oil stocks of around 80,000 b/d, which helped to drive down the Brent barrel price at the end of 2022 to its lowest level in 12 months (76 dollars).

For 2023, in a context in which the global economy is expected to expand, we believe that the global demand for oil will recover, with the rebound in the second half of the year being particularly pronounced. China's economic reopening, despite uncertainty over how fast it will occur and what shape it will take, will play a key role in that increase. The IEA and OPEC agree that global oil demand will reach an all-time high in 2023 (101.7 million b/d), 2% higher than the previous year, and that around half of this increase will be due to China's reopening. While supply and demand are likely to remain balanced during the first two quarters of the year, the

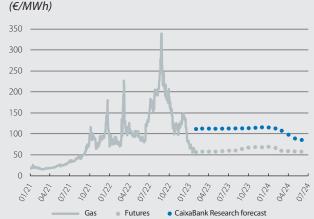
1. According to data from the International Energy Agency (IEA), in Q4 2022 the demand for crude oil fell by 910,000 b/d in year-on-year terms in OECD countries and by 130,000 b/d in China.

Brent oil price



Source: BPI Research, based on data from Bloomberg

Natural gas price *



Note: * TTF, the benchmark natural gas price in Europe. **Source:** BPI Research, based on data from Bloomberg.

anticipated buoyancy of consumption during the second half of the year could push prices upwards if the supply does not react sufficiently. OPEC's limited flexibility to agree on production increases and the reduction in oil exports from Russia³ (the third biggest producer in the world behind the US and Saudi Arabia) are likely to be the main obstacles in this regard. In addition to these factors, the gradual recovery in the economic scenario ought to be accompanied by a moderation of the strength of the US dollar and a greater risk appetite among investors, both of which tend to add upward pressure on prices.

^{2.} OPEC and its allies agreed to cut the net supply by 2 million b/d from the target production of 33 million b/d, beginning in November 2022.

^{3.} The main international organizations stress that, despite the high degree of uncertainty regarding the outlook, with the EU embargo on Russian oil exports coming into force and the 60-dollar price cap imposed on the Urals barrel by the G7 on 5 December, Russian oil exports to the rest of the world could be reduced by 20%.



On the basis of these aspects, we estimate that the Brent oil price could rise over the course of the year, potentially exceeding 90 dollars by December (with a 2023 average of 86 dollars).

Gas prices moderate, but uncertainty persists

Last summer, the cut-off of Russian gas supplies to Europe via Nord Stream 1 caused the price of the Dutch TTF (the main benchmark in Europe) to surge to record levels (339 euros/MWh), as well as setting off alarm bells about the risk of a winter marked by blackouts and energy restrictions across the continent.

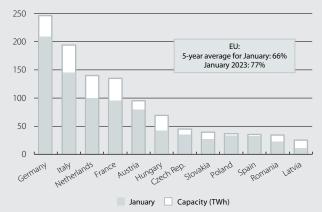
Fortunately, the worst omens have not materialised and prices have dropped by 80% since the August peak. Among the main factors that have favoured this sharp reduction we find, on the one hand, the increase in imports of liquefied natural gas (LNG), which facilitated the rapid growth of natural gas reserves in much of Europe, reaching a peak of 95% at the beginning of November. In addition, the demand for European gas (for both industrial and household use) fell by 12% in December compared to the average of the last five years as a result of the optimisation of energy use, the commissioning of renewable and nuclear energy sources and the milder weather.

All this means that the first few weeks of 2023 are proving clearly more favourable than expected and that the most extreme scenarios have been diluted. However, despite the improved confidence among investors and European governments, 2023 will still be a demanding year. The challenge of replenishing reserves ahead of next winter with the reduced contribution from Russia⁴ will be key in determining European gas prices. The lower imports from Russia will no doubt have to be offset by more purchases from the US, Qatar, Nigeria or Algeria (Norway does not expect to materially increase its exports). In the second half of the year, China is also expected to increase its demand for liquefied natural gas, which will push up prices. However, the containment of European demand, the increase in the regasification capacity in some northern European countries⁵ and the progress in reducing natural gas in the energy mix will continue to have a cushioning effect on prices. Similarly, experts in the sector point out that if this winter ends with gas reserves at above 50% of capacity, then the supply outlook for the winter of 2023 will be relatively secure.

4. In 2022, European imports of natural gas from Russia, through the four main gas pipelines (Turkstream, Ukraine, NordStream and Yamal Europe) amounted to 43.7 billion cubic meters. In 2023, only the first two are expected to be operational, so imports could halve.

5. JP Morgan estimates that between 2023 and the beginning of 2024, the countries of north-western Europe will be able to increase their regasification capacity by some 37 billion cubic metres a year.

Natural gas: level of gas reserves in Europe Capacity (TWh)



Source: BPI Research, based on data from AGSI.

Given these considerations, we have significantly revised down our gas price forecasts, but we maintain a more conservative forecast (average price in 2023 of 113 euros/MWh for the Dutch TTF) than that anticipated by the markets at this early stage of the year. In addition to the challenges already mentioned, it should be noted that factors such as a quicker than expected recovery in economic activity in China or an increase in the restrictions on the flows of energy supplies from Russia, besides introducing new doses of volatility, could fuel upward pressure on the already stressed markets.



Interest rates (%)

	31-January	31-December	Monthly change (bp)	Year-to-date (bp)	Year-on-year change (bp)
Euro area					
ECB Refi	2.50	2.50	0	0.0	250.0
3-month Euribor	2.51	2.13	38	38.0	305.9
1-year Euribor	3.41	3.29	12	12.2	384.4
1-year government bonds (Germany)	2.78	2.60	18	17.9	345.1
2-year government bonds (Germany)	2.65	2.76	-11	-11.3	312.1
10-year government bonds (Germany)	2.29	2.57	-29	-28.5	224.9
10-year government bonds (Spain)	3.28	3.66	-38	-38.1	250.5
10-year government bonds (Portugal)	3.19	3.59	-40	-39.6	249.7
US					
Fed funds (upper limit)	4.50	4.50	0	0.0	425.0
3-month Libor	4.81	4.77	5	4.6	451.1
12-month Libor	5.33	5.48	-16	-15.6	439.1
1-year government bonds	4.65	4.69	-3	-3.3	388.9
2-year government bonds	4.20	4.43	-22	-22.5	303.6
10-year government bonds	3.51	3.87	-37	-36.8	171.9

Spreads corporate bonds (bps)

	31-January	31-December	Monthly change (bp)	Year-to-date (bp)	Year-on-year change (bp)
Itraxx Corporate	79	91	-11	-11.2	21.3
Itraxx Financials Senior	88	99	-11	-10.8	22.8
Itraxx Subordinated Financials	156	172	-16	-16.2	33.2

Exchange rates

	31-January	31-December	Monthly change (%)	Year-to-date (%)	Year-on-year change (%)
EUR/USD (dollars per euro)	1.086	1.071	1.5	1.5	-3.6
EUR/JPY (yen per euro)	141.320	140.410	0.6	0.6	9.3
EUR/GBP (pounds per euro)	0.882	0.885	-0.4	-0.4	5.8
USD/JPY (yen per dollar)	130.090	131.120	-0.8	-0.8	13.4

Commodities

	31-January	31-December	Monthly change (%)	Year-to-date (%)	Year-on-year change (%)
CRB Commodity Index	557.0	554.8	0.4	0.4	-4.9
Brent (\$/barrel)	84.5	85.9	-1.7	-1.7	-5.2
Gold (\$/ounce)	1,928.4	1,824.0	5.7	5.7	7.1

Equity

	31-January	31-December	Monthly change (%)	Year-to-date (%)	Year-on-year change (%)			
S&P 500 (USA)	4,076.6	3,839.5	6.2	6.2	-10.3			
Eurostoxx 50 (euro area)	4,163.5	3,793.6	9.7	9.7	-1.4			
Ibex 35 (Spain)	9,034.0	8,229.1	9.8	9.8	3.5			
PSI 20 (Portugal)	5,886.3	5,726.1	2.8	2.8	4.6			
Nikkei 225 (Japan)	27,327.1	26,094.5	4.7	4.7	0.9			
MSCI Emerging	1,031.5	956.4	7.9	7.9	-15.0			



2023, a year of digestion for the global economy

The outlook improves within an environment of weakness.

The world economy is facing a slowdown in 2023 marked by the need to digest the consequences of the war in Ukraine, high inflation and the consequent monetary tightening. Within this context, the latest data provide some positive news: economic activity has held up better than expected over the winter and inflation continues to slow down. The savings buffer, the strength of the labour market and the fiscal aid to help confront the energy crisis have supported demand, while the supply constraints have been alleviated by the normalisation of the bottlenecks and a moderation in energy prices. All this leads us to expect a less marked economic slowdown than was feared a few months ago, although this improvement still does not allow us to escape the environment of high economic and geopolitical uncertainty. In addition, the monetary tightening is beginning to be felt and its consequences will be more tangible in 2023.

Inflation: moderation in energy but inertia in the core components. One of the major uncertainties for which we should get some clarity in 2023 is the speed of the correction in inflation. From last year's highs, headline inflation has been slowing while the underlying pressures have shown more inertia: the latest data show headline inflation of 6.5% yearon-year in the US (corresponding to December; –2.6 pps versus the peak) and of 8.5% in the euro area (January; -2.1 pps). The main force behind this decline is the gradual correction in energy prices, which will intensify in 2023, both due to the base effects themselves and because of the better outlook in the energy sphere (especially in the European gas market, with a decrease in the futures for 2023 in January of around 50% compared to the Q4 2022 average). Inflation will also decline on the back of the normalisation of the bottlenecks that had been hampering global supply and which had already improved markedly by the end of 2022. The inertia for inflation will most likely come from the components most sensitive to the labour market, where the dynamics in the US and Europe could be guite different: US wages appear to be slowing from their recent highs (from 6.7% in summer to 6.1% in December, according to the Atlanta Fed's benchmark indicator), while in Europe they began low but are gradually increasing.

Europe held up better than expected in 2022; the US and China disappointed. The figures published for Q4 2022 GDP have reflected a somewhat surprising disparity between the world's major economies. So far, economic activity in the euro area has withstood the war in Ukraine better than expected, thanks to a mild winter, high gas reserves (at the end of January they were still at 70% of capacity) and savings in gas consumption. Specifically, growth for the year as a whole (3.5%) was close to what had been expected at the beginning of 2022, and a contraction in Q4 was avoided (+0.1% quarter-on-quarter). Moreover, although GDP would have remained stagnant without the abnormal contribution of Ireland (GDP growth of +3.5% guarter-on-guarter), the two major economies most dependent on Russian gas – Germany and Italy – managed to retreat less than feared in Q4 (-0.2% and -0.1%, respectively). In contrast, the world's two biggest economies grew much less than expected in

IMF: GDP
Annual change (%)

	Fore	ecast	Change versus the WEO of October 2022			
	2023	2024	2023	2024		
Global economy	2.9	3.1	0.2	-0.1		
Advanced economies	1.2	1.4	0.1	-0.2		
US	1.4	1.0	0.4	-0.2		
Euro area	0.7	1.6	0.2	-0.2		
Germany	0.1	1.4	0.4	-0.1		
France	0.7	1.6	0.0	0.0		
Italy	0.6	0.9	0.8	-0.4		
Spain	1.1	2.4	-0.1	-0.2		
Emerging and developing economies	4.0	4.2	0.3	-0.1		
China	5.2	4.5	0.8	0.0		
India	6.1	6.8	0.0	0.0		
Russia	0.3	2.1	2.6	0.6		
Brazil	1.2	1.5	0.2	-0.4		
South Africa	1.2	1.3	0.1	0.0		

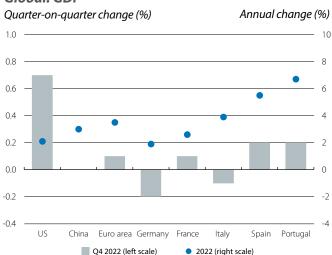
Source: BPI Research, based on data from the IMF (WEO, January 2023 update).

Global: supply chain pressure index (Standard deviations from the average)



Source: BPI Research, based on data from the New York Fed.

Global: GDP



Source: BPI Research, based on data from the BEA, the National Statistics Institute of China and Furostat.



2022: the US did so by 2.1% (vs. 3.5% projected a year ago) and China, by 3.0% (vs. 4.7%). The disappointment of the former reflects weak GDP data in the first half of the year, while in Q4 economic activity grew by 0.7% quarter-on-quarter. China, meanwhile, was heavily constrained by the COVID-related restrictions, to the point that GDP stagnated in Q4.

Cautious optimism in the first European indicators of 2023.

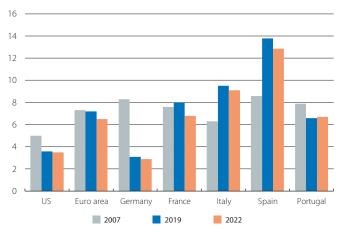
Against a backdrop of economic activity holding up, a slowdown in inflation and a moderation in energy prices, the first economic indicators of the year in Europe signal an improvement. Specifically, the euro area PMI (50.3 points in January) emerged from recessive territory for the first time in six months and the sentiment index produced by the European Commission (ESI) improved for the third consecutive month, reaching 98 points (very close to the 100-point level which marks the historical average). These indicators are in addition to a solid labour market, with a very low unemployment rate (6.6% in December) and an activity rate at its peak (75%). Taken together, the data are still showing stagnant economic activity, but they also suggest that the weakness is not as pronounced as feared. Therefore, we have improved our 2023 GDP forecasts for the euro area and its major economies.

Mixed signals in the US. US GDP managed to grow by +0.7% in Q4, but its composition reveals some indications of a slowdown in 2023. Specifically, investment, and residential investment in particular (-1.7% and -7.5% quarter-on-quarter, respectively, in Q4), has been feeling the effect of the Fed's rate hikes for several quarters now. In fact, data for the real estate market show a sector in retreat, in terms of both prices (the Case-Shiller index went from growing by over 20% year-on-year in early 2022 to just under 8% in November) and sales transactions (home sales fell again in December for the eleventh consecutive month, according to data from the National Association of Realtors). Moreover, the confidence indices, which had remained high until autumn, have deteriorated in the manufacturing sector (January ISM at 47.4 points) and show significant volatility in services (ISM at 49.6 points in December and 55.2 in January). The signs of slowdown are less visible in the labour market, which remains very robust with historically low unemployment (3.5% in December) and a strong job creation rate (+291,000 on average in Q4 2022 and an exceptional +517,000 in January) and is providing a significant tailwind for the economy.

China seeks a return to normality. After an initially disorderly withdrawal of the zero-COVID policy, with a major wave of infections and declines in mobility, the latest data are beginning to suggest a revival of economic activity. Beyond the GDP data already mentioned, the latest figures for industrial production and retail sales were somewhat better than expected (+1.3% and -1.8% year-on-year in December, respectively), while real-time indicators point to a rebound in mobility in January. Also, the Caixin PMI for the services sector climbed to 52.9 points in January, while the manufacturing PMI remained at 49.2 points. However, the economic reopening faces an uncertain context, dominated by doubts over the population's degree of immunisation (according to some estimates by the University of Beijing, by mid-January just over 60% of the population had been infected since the beginning of the pandemic, although these figures are shrouded in high uncertainty). The coming weeks will be key: with the Lunar New Year in China, there was a significant movement of people to rural areas, with older populations and comparatively low vaccination levels.

Unemployment rate

(% of the labour force)

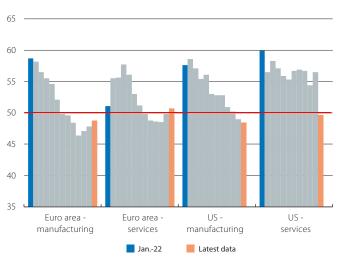


Note: Data at the end of the period.

Source: BPI Research, based on data from the BLS and Eurostat.

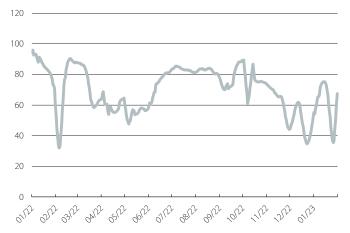
Economic activity indicators: PMI (euro area) and ISM (US)

Level



Source: BPI Research, based on data from Bloomberg.

China: passengers in the metro Index (100 = Q4 2019)



Note: Aggregate of Beijing, Shenzhen, Shanghai, Hangzhou, Chengdu, Nanjing, Suzhou, Zhengzhou, Chongming, Wuhan and Xi'an.

Source: BPI Research, based on data from Bloomberg

Europe benefits from a relatively mild winter

For the first time in many months, the outlook for the European economy has begun to improve. This shift in sentiment partly offsets the certain negative overreaction we witnessed last summer, when it was feared that the increased demand for gas for heating in winter could lead to some form of energy rationing for industry in order to prevent a depletion of reserves before the spring. However, on this occasion the weather has played in our favour: the winter is proving milder than usual and is keeping gas consumption contained (in 2022, it was 15% lower than the average consumption of the previous two years, according to Bruegel), and this is easing the pressure on prices and allowing gas reserves to remain close to the highs for this time of year (around 80%). This factor, together with the measures taken to combat the energy crisis (focused, above all, on promoting energy savings), have substantially modified our energy outlook and we now consider it feasible for oil and, above all, gas prices to remain well below the levels we feared a few months ago (see the Focus «Energy: with 2022 behind us, will 2023 be as turbulent?» in this same report).

What seems clear is that, even if there were a cold snap in the coming weeks, it is now unlikely that we will have to endure energy rationing in the short term, and this dilutes the more pessimistic scenarios we were considering a few months ago. In addition, many of the indicators for both economic activity and demand have shown a more favourable performance than expected in recent months. This improvement in the outlook for the euro area is not incompatible with the behaviour shown by GDP in Q4 2022. The region grew by 0.1% quarter-on-quarter, although this was largely thanks to the surprising growth of Ireland (3.5% quarter-on-quarter), since neither Germany (–0.2%) nor Italy (–0.1%) managed to avoid contraction and France practically stagnated (0.1%).

In fact, the decline suffered by Germany dampens the optimism shown by various official institutions at the start of the year when they declared that the country will have avoided a contraction in Q4. However, the decline in Q4 has been less pronounced than had been expected a few months ago and we should also bear in mind that the figure is preliminary, meaning that it could still be subject to revisions. Moreover, the recovery in the main business confidence indicators suggests that the beginning of 2023 may not be as gloomy as had been anticipated at the end of last summer. Indeed, this is a hypothesis backed up by the Bundesbank's weekly economic activity indicator, which is showing timid signs of improvement in the early stages of this year, albeit within a context of clear weakness. In this regard, the German government's own estimates place growth for 2023 as high as 0.2%, in contrast to the 0.4% recession

Economic Surprise Index *

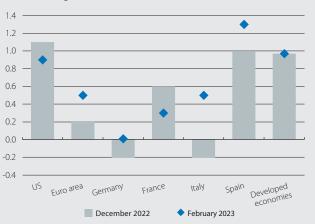


Notes: * Defined as the historical weighted deviations from the differences between the actual published data and analysts' expectations. A positive value means that the published data has been better than expected; if it is negative, this indicates that the actual data was disappointing relative to expectations.

Source: BPI Research, based on data from Citigroup and Refinitiv

Global: 2023 GDP forecasts

Annual change (%)



Source: BPI Research, based on data from internal forecasts.

estimated last autumn. As a result, it seems that the deterioration in economic activity in Q1 2023 will be less pronounced than we had feared last summer. This explains the upward revision of our forecasts for GDP growth in 2023, up to 0.0%, compared to a recession of 0.2% estimated a few months ago.

Italy has also performed much better than expected despite the setback at the end of the year, achieving the best economic performance in the region during 2022, and this trend could well continue according to the main industrial climate indicators. Indeed, the ESI recorded a substantial improvement during the course of Q4 and in December reached values of 100.3, compared to 95.8 in the euro area, 94.6 in Germany and 93.3 in France. In the case of France, *a priori* one of the economies least



exposed to Russian gas, its growth has fallen somewhat short of our expectations, largely because it has had to deal with electricity generation issues in a network that is highly dependent on nuclear power plants with maintenance problems. So much so that almost 40% of its nuclear reactors have suffered service interruptions, which has led to electricity generation in France falling to its lowest in seven years and has forced the country to be a net importer of energy.

In short, we have applied upward revisions to growth in 2023 across most of the major countries: 1 +0.2 pps in Germany, up to 0.0%; +0.7 pps in Italy, up to 0.5%; offsetting the -0.3 pps in France, down to 0.3%; hence we revise upwards our growth forecast for the euro area by 0.3 pps, to 0.5%. For 2024, we keep the current scenario virtually unchanged.

On the other hand, parallel to this improved performance in recent months and the outlook with which economic activity has begun 2023, the headwinds for the second half of the year have also gained some strength. The last month has seen a significant heightening of expectations regarding a potential tightening of monetary policy on the part of the ECB, due to the greater persistence in inflation which the central bank is anticipating. In fact, our interest rate forecast scenario has been revised upwards and we now think the ECB's benchmark rate could reach 3.5% by mid-year.

In this context of improved economic outlook, inflation has begun to show timid signs of moderation, although it is still very high (9.2% in December). During the course of 2023, the decline in headline inflation will intensify thanks to the stabilisation of energy prices, the normalisation of the bottlenecks and the economic slowdown (see the Dossier in this same report). As such, it could fall to slightly below 4% by the end of 2023, although second-round effects and the withdrawal of the various fiscal measures implemented to offset the rising energy prices are likely to continue to have considerable inertia, resulting in the 2% target rate not being reached until late 2024.

This better performance of the European economy contrasts with the evidence of a greater cooling than expected in the US economy at the end of 2022 and in early 2023, which has led to a downward revision of the growth forecast for the US, although we remain confident that it will avoid a recession (see the Focus «US: land as best you can» in this *Monthly Report*).

However, it must be borne in mind that, although expectations for the European economy have improved, our forecast scenario is still one of almost stagnation

1. For Spain, we revised growth for 2023 up by 0.3 pps, to 1.3% (see the Focus «The outlook for the Spanish economy improves» in this same report).

Euro area: headline and core inflation

Year-on-year change (%)



Source: BPI Research, based on data from Eurostat and internal forecasts.

and uncertainty remains very high. The war in Ukraine is showing no sign of ending in the short term and the end of China's zero-COVID policy will affect the global economy. Indeed, the reopening of the Chinese economy is a double-edged sword for developed economies. On the one hand, it is quite likely that there will be a notable rebound in economic activity in the spring (once the first waves of contagion after the reopening process have been overcome) and that global supply chains will be stimulated. On the other hand, however, this revival will exert clear pressure on the demand for many industrial commodities, including oil and gas, and this will push up their prices. Moreover, our scenario contemplates a clear acceleration in China's economy in the second half of 2023, coinciding with the period in which Europe will once again need to replenish its gas reserves ahead of the 2023-2024 winter in a scenario in which, a priori, the supply of Russian gas to Europe will remain almost nil. When the time comes, the «winter» variable will once again be key for elaborating forecast scenarios. In short, although the worst scenarios have dissipated in the short term, it is still too early to declare victory in a year that will continue to be marked by high uncertainty and complexity.



US: land as best you can

Despite the positive growth data for Q4 2022, more than half of the analysts on the Bloomberg consensus panel believe that in 2023 we will see a fall in US GDP for two consecutive quarters. Also, the probability they assign to a recession in the US in the next 12 months is around 70% and the sovereign yield curve has been inverted in the section spanning from three months to 10 years since October 2022 – an almost infallible predictor of recession. What arguments support this pessimistic view of a hard landing for US economic activity? Are there any reasons to think it is possible to avoid a recession and make a soft landing?

The US is not yet in recession

The most recent economic data do not show an economy in recession, although all the indicators, especially those most closely associated with the perceptions of economic agents, reflect a widespread downward trend. For instance, the PMI and ISM indices lie below the 50-point threshold which separates levels compatible with economic expansion from those associated with a contraction in activity. Similarly, consumer confidence indicators are at very low levels (for example, the University of Michigan Consumer Sentiment Index is below the levels recorded during the pandemic and, in June 2022, recorded the lowest level since 1978). The indicators for industrial production and retail sales, meanwhile, paint a less pessimistic picture with year-onyear changes slightly above the historical average, albeit with a downward trend. On the other hand, the labour market is not only showing no signs of weakness, but it is at saturation levels – for some indicators at levels not seen before. For instance, for every unemployed person there are currently 1.7 job vacancies, and this ratio reached close to 2 in April last year, well above the historical average of 0.64. The unemployment rate,



Source: BPI Research, based on data from the Bureau of Labor Statistics.

meanwhile, stands at an all-time low of 3.5% and the rate of job creation is somewhat higher than the average for 2015-2019, although it has moderated. Thus, taking into account this combination of indicators, can we say that the US is in recession? Recently, we explained that a recession is understood as a significant reduction in economic activity that is widespread across various areas of the economy and is relatively prolonged in time. Another common (although incomplete) definition is that a technical recession ocurres when there are two consecutive guarters of contractions in GDP. If we follow the second definition, we could conclude that the US was already in a recession in 2022, and we would not rule out that it could do so again in 2023. However, with the first definition, which is the one used by the NBER, we cannot state that the US entered a recession in 2022 nor that it is at risk of approaching such a situation in the short term.

US: main economic activity indicators

	December 2022	November 2022	October 2022	September 2022	Average for 2015-2019	Average during financial crisis (2008-2009)	Average during COVID (March- December 2020)
Retail sales (% YoY)	6.0	6.0	8.0	8.4	3.5	-4.2	-0.3
Industrial production (% YoY)	1.7	2.2	3.4	5.0	0.1	-7.3	-8.1
Conference Board - Consumer confidence (index)	108.3	101.4	102.2	107.8	115.3	51.6	94.9
University of Michigan - Consumer sentiment (index) *	64.6	59.7	56.8	59.9	95.2	65.0	77.8
University of Michigan - Consumer expectations (index) *	62.0	59.9	55.6	56.2	85.6	60.7	72.2
ISM manufacturing (index)	48.4	49.0	50.2	50.9	54.0	46.8	52.8
ISM services (index)	49.6	56.5	54.4	56.7	56.7	46.8	53.9
Unemployment rate (%)	3.5	3.6	3.7	3.5	4.4	7.5	9.0
Job creation (thousands of workers)	223.0	256.0	263.0	269.0	190.2	-358.5	-1,000.7

Note: * Data corresponding to the month after the one indicated. **Source:** BPI Research, based on data from Bloomberg.

1. See the Focus «US: in recession?» in the MR09/2022.



The headwinds for 2023

What supports the pessimistic view held by the consensus of analysts? Firstly, the cycle of monetary tightening carried out by the Federal Reserve in 2022 has been of an intensity not seen since the 1980s. The rise in interest rates, together with the process of reducing the size of its balance sheet, will have a major impact on economic activity. Specifically, it is estimated that for every 100-bp increase in official interest rates, GDP after four quarters is reduced by almost 0.5 pps.² Thus, the increase in rates observed to date, and which will continue in Q1 2023, could deduct more than 2 pps from US GDP in 2023. This effect is already visible in the component of GDP that is most sensitive to interest rates, namely residential investment.³

Another headwind for the US is the fall in confidence indicators which we mentioned earlier and the scenario of permanent uncertainty into which the global economy, including the US, has settled. Although the drop in these confidence and expectations indicators does not directly imply a contraction in economic activity, it does give us an indication that households and firms may be more cautious in their actions and, for example, postpone investment and consumption decisions. Finally, the US is not immune to global dynamics. Indeed, these headwinds are not only limited to the other side of the Atlantic. The economic slowdown is global in nature, so US foreign demand may lack the strength to offset the burdens that are weighing down domestic demand.

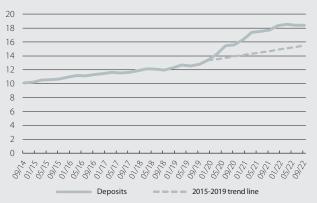
Will the tailwinds be strong enough?

In this context, the reasons to be optimistic about the US economy may be fewer, but they are still present. The main one is private consumption, which we expect will be able to make a positive contribution to GDP during 2023. This is especially important in the case of the US, as private consumption is the main driver of the economy, accounting for some 70% of GDP (in the euro area it represents around 50%, while in China it is less than 40%). This resilience which we forecast is based on two assumptions: the strength of the labour market and the savings accumulated during the pandemic. The first factor is the key assumption and it is shared by various members of the Federal Reserve. According to their estimates published in the latest macroeconomic table, which coincide with ours in many respects, the rebound in the unemployment rate ought to be limited. This is because of the significant mismatch which currently exists between the supply and demand for employment; there are still many job vacancies,⁴ so it is reasonable to assume that some of the workers who would potentially

- 2. See J. Rush (2021). «Bloomberg Economics Forecast Models for the U.S., U.K. and Euro Area». Bloomberg.
- 3. The residential investment component, which mainly reflects trends in the real estate market, has accentuated its fall in 2022, although investment as a whole continued to grow in 2022 thanks to the rest of the subcomponents (investment in capital goods, structures and intellectual property).
- 4. More than 10 million, in fact, while the average since 2000 is slightly less than half this figure.

US: household deposits

(USD trillions)



Note: The dashed line shows the trend in deposits which would have occurred assuming that the average growth observed between 2015 and 2019 had continued from Q1 2020 onwards. **Source:** BPI Research, based on data from the Federal Reserve.

lose their jobs in an environment marked by a slowdown and rising interest rates could find other jobs.

The other factor – the pent-up savings – could act as a buffer for the reduction in households' purchasing power. As we saw in a recent article,⁵ households accumulated savings up to 12% of GDP and, according to the latest estimates, they have not yet consumed 60% of that amount. While these savings are certainly not likely to be evenly distributed among the various income percentiles, whose propensity to consume differs, and that a portion of the savings are held in assets that are not highly liquid or which may have even suffered losses due to the fluctuations in the financial markets, some support can still be offered to private consumption. In particular, we estimate that US household deposits are 18% higher than they would have been were it not for the pandemic (they were 23% higher at one point, but the lower savings rate recorded in the closing weeks of 2022 has begun to drain deposits).

The current scenario is challenging, and this will continue to be the case during 2023. There are many uncertainties which we await to see how they will unfold this year, including the inflationary pressures and financial conditions. If, as we believe, inflation continues to decline but remains still at high levels, its influence as a headwind could fade compared to 2022. Also, the easing of financial conditions (for example, the sovereign 10-year interest rate and the interest rate on a standard 30-year mortgage have fallen by around 70 bps and 90 bps, respectively, since their peaks in Q4 2022) also indicates that this headwind could blow less strongly in 2023. We will see whether these elements, together with the strength of the labour market and the significant pent-up savings, help to cushion a potential hard landing.

^{5.} See the Focus «US: how can the accumulated savings support the economy?» in the MR07/2022.



Year-on-year (%) change, unless otherwise specified

UNITED STATES

2021	2022	Q1 2022	Q2 2022	Q3 2022	Q4 2022	11/22	12/22	01/23
5.9	2.1	3.7	1.8	1.9	1.0	1.0	_	_
17.5	8.6	11.2	7.8	8.5	7.1	6.4	7.2	
112.7	104.5	108.1	103.4	102.2	104.2	101.4	109.0	107.1
4.9	3.9	4.8	4.5	4.1	2.4	2.2	1.6	
60.7	53.5	57.7	55.0	52.2	49.1	49.0	48.4	47.4
1,605	1,555	1,720	1,647	1,450	1,403	1,401	1,382	
267		299	314	310		303		
5.4	3.6	3.8	3.6	3.6	3.6	3.6	3.5	
58.4	60.0	59.9	59.9	60.0	60.0	59.9	60.1	
-3.6		-3.9	-4.0	-3.9		-3.8		
4.7	8.0	8.0	8.6	8.3	7.1	7.1	6.5	
3.6	6.2	6.3	6.0	6.3	6.0	6.0	5.7	
	5.9 17.5 112.7 4.9 60.7 1,605 267 5.4 58.4 -3.6	5.9 2.1 17.5 8.6 112.7 104.5 4.9 3.9 60.7 53.5 1,605 1,555 267 5.4 3.6 58.4 60.0 -3.6	5.9 2.1 3.7 17.5 8.6 11.2 112.7 104.5 108.1 4.9 3.9 4.8 60.7 53.5 57.7 1,605 1,555 1,720 267 299 5.4 3.6 3.8 58.4 60.0 59.9 -3.6 -3.9 4.7 8.0 8.0	5.9 2.1 3.7 1.8 17.5 8.6 11.2 7.8 112.7 104.5 108.1 103.4 4.9 3.9 4.8 4.5 60.7 53.5 57.7 55.0 1,605 1,555 1,720 1,647 267 299 314 5.4 3.6 3.8 3.6 58.4 60.0 59.9 59.9 -3.6 -3.9 -4.0 4.7 8.0 8.0 8.6	5.9 2.1 3.7 1.8 1.9 17.5 8.6 11.2 7.8 8.5 112.7 104.5 108.1 103.4 102.2 4.9 3.9 4.8 4.5 4.1 60.7 53.5 57.7 55.0 52.2 1,605 1,555 1,720 1,647 1,450 267 299 314 310 5.4 3.6 3.8 3.6 3.6 58.4 60.0 59.9 59.9 60.0 -3.6 -3.9 -4.0 -3.9 4.7 8.0 8.0 8.6 8.3	5.9 2.1 3.7 1.8 1.9 1.0 17.5 8.6 11.2 7.8 8.5 7.1 112.7 104.5 108.1 103.4 102.2 104.2 4.9 3.9 4.8 4.5 4.1 2.4 60.7 53.5 57.7 55.0 52.2 49.1 1,605 1,555 1,720 1,647 1,450 1,403 267 299 314 310 5.4 3.6 3.8 3.6 3.6 3.6 58.4 60.0 59.9 59.9 60.0 60.0 -3.6 -3.9 -4.0 -3.9 4.7 8.0 8.0 8.6 8.3 7.1	5.9 2.1 3.7 1.8 1.9 1.0 1.0 17.5 8.6 11.2 7.8 8.5 7.1 6.4 112.7 104.5 108.1 103.4 102.2 104.2 101.4 4.9 3.9 4.8 4.5 4.1 2.4 2.2 60.7 53.5 57.7 55.0 52.2 49.1 49.0 1,605 1,555 1,720 1,647 1,450 1,403 1,401 267 299 314 310 303 5.4 3.6 3.8 3.6 3.6 3.6 3.6 58.4 60.0 59.9 59.9 60.0 60.0 59.9 -3.6 -3.9 -4.0 -3.9 -3.8 4.7 8.0 8.0 8.6 8.3 7.1 7.1	5.9 2.1 3.7 1.8 1.9 1.0 1.0 - 17.5 8.6 11.2 7.8 8.5 7.1 6.4 7.2 112.7 104.5 108.1 103.4 102.2 104.2 101.4 109.0 4.9 3.9 4.8 4.5 4.1 2.4 2.2 1.6 60.7 53.5 57.7 55.0 52.2 49.1 49.0 48.4 1,605 1,555 1,720 1,647 1,450 1,403 1,401 1,382 267 299 314 310 303 5.4 3.6 3.8 3.6 3.6 3.6 3.6 3.5 58.4 60.0 59.9 59.9 60.0 60.0 59.9 60.1 -3.6 -3.9 -4.0 -3.9 -3.8 4.7 8.0 8.0 8.6 8.3 7.1 7.1 6.5

JAPAN

	2021	2022	Q1 2022	Q2 2022	Q3 2022	Q4 2022	11/22	12/22	01/23
Activity									
Real GDP	2.1		1.2	1.6	1.5		_	_	_
Consumer confidence (value)	36.3	32.2	34.8	33.1	31.2	29.6	28.6	30.3	31.0
Industrial production	5.6	0.1	-0.6	-3.6	4.0	0.5	-0.9	-1.2	
Business activity index (Tankan) (value)	13.8	9.5	14.0	9.0	8.0	7.0	_	_	_
Unemployment rate (% lab. force)	2.8	2.6	2.7	2.6	2.6	2.5	2.5	2.5	
Trade balance 1 (% GDP)	-0.3	-4.9	-1.0	-1.9	-3.0	-5.1	-4.6	-4.9	
Prices									
Headline inflation	-0.2	2.5	0.9	2.4	2.9	3.9	3.8	4.0	
Core inflation	-0.5	1.1	-0.9	0.8	1.5	2.8	2.8	3.0	

CHINA

	2021	2022	Q1 2022	Q2 2022	Q3 2022	Q4 2022	11/22	12/22	01/23
Activity									
Real GDP	8.4	3.0	4.8	0.4	3.9	2.9	-	-	-
Retail sales	12.4	-0.8	1.6	-4.9	3.5	-2.7	-0.5	-5.9	-1.8
Industrial production	9.3	3.4	6.3	0.6	4.8	2.8	5.0	2.2	1.3
PMI manufacturing (value)	50.5	49.1	49.9	49.1	49.5	48.1	49.2	48.0	47.0
Foreign sector									
Trade balance 1,2	681	889	728	824	908	889	907.7	905.1	889.1
Exports	30.0	7.1	15.7	12.9	10.0	-6.8	-0.6	-9.0	-10.1
Imports	30.0	1.1	10.6	1.2	0.6	-6.5	-0.7	-10.6	-7.5
Prices									
Headline inflation	0.9	2.0	1.1	2.2	2.7	1.8	2.1	1.6	1.8
Official interest rate ³	3.80	3.65	3.7	3.7	3.7	3.7	3.7	3.7	3.7
Renminbi per dollar	6.5	6.7	6.3	6.6	6.9	7.1	7.2	7.2	7.0

Notes: 1. Cumulative figure over last 12 months. 2. Billion dollars. 3. End of period.

Source: BPI Research, based on data from the Department of Economic Analysis, Bureau of Labor Statistics, Federal Reserve, Standard & Poor's, ISM, National Bureau of Statistics of Japan, Bank of Japan, National Bureau of Statistics of China and Refinitiv.



EURO AREA

Activity and employment indicators

Values, unless otherwise specified

	2021	2022	Q1 2022	Q2 2022	Q3 2022	Q4 2022	11/22	12/22	01/23
Retail sales (year-on-year change)	5.5		6.1	1.1	-0.7		-2.8		
Industrial production (year-on-year change)	9.0		-0.2	0.4	1.8		2.0		
Consumer confidence	-7.5		-13.6	-22.6	-26.9	-26.9	-23.8	-22.1	-20.9
Economic sentiment	110.7		111.2	103.9	96.5	96.5	95.1	97.1	99.9
Manufacturing PMI	60.2		57.8	54.1	49.3	49.3	47.1	47.8	48.8
Services PMI	53.6		54.1	55.6	49.9	49.9	48.5	49.8	50.7
Labour market									
Employment (people) (year-on-year change)	1.4		3.0	2.6	1.7		_	_	_
Unemployment rate (% labour force)	7.7	6.7	6.8	6.7	6.7	6.6	6.6	6.6	
Germany (% labour force)	3.6	3.0	3.1	3.0	3.0	3.0	3.0	2.9	
France (% labour force)	7.9	7.3	7.3	7.6	7.2	7.1	7.0	7.1	
Italy (% labour force)	9.5	8.1	8.5	8.1	7.9	7.8	7.8	7.8	
Real GDP (year-on-year change)	5.5	3.5	5.5	4.3	2.3	1.9	1.9	_	_
Germany (year-on-year change)	2.6	1.9	3.5	1.7	1.4	1.1	1.1	_	_
France (year-on-year change)	6.8	2.6	4.8	4.2	1.0	0.5	0.5	_	_
Italy (year-on-year change)	6.7	3.9	6.4	5.0	2.7	1.7	1.7	_	_

Prices

Year-on-year change (%), unless otherwise specified

	2021	2022	Q1 2022	Q2 2022	Q3 2022	Q4 2022	11/22	12/22	01/23
General	2.6	8.4	6.1	8.0	9.3	10.0	10.1	9.2	8.5
Core	1.5	3.9	2.7	3.7	4.4	5.1	5.0	5.2	5.2

Foreign sector

Cumulative balance over the last 12 months as % of GDP of the last 4 quarters, unless otherwise specified

	2021	2022	Q1 2022	Q2 2022	Q3 2022	Q4 2022	11/22	12/22	01/23
Current balance	2.6		1.8	0.7	-0.8		-0.9		
Germany	7.4		6.6	5.4	4.2		3.8		
France	0.4		0.1	-0.4	-1.3		-1.8		
Italy	3.1		2.1	1.0	-0.6		-0.8		
Nominal effective exchange rate 1 (value)	94.2		92.5	90.1	88.9	•••	92.2		•••

Credit and deposits of non-financial sectors

Year-on-year change (%), unless otherwise specified

	2021	2022	Q1 2022	Q2 2022	Q3 2022	Q4 2022	11/22	12/22	01/23
Private sector financing									
Credit to non-financial firms ²	3.5	6.7	4.4	6.1	8.4	7.8	8.3	6.3	
Credit to households ^{2,3}	3.8	4.4	4.4	4.6	4.5	4.0	4.1	3.8	
Interest rate on loans to non-financial firms 4 (%)	1.2	1.8	1.2	1.4	1.8	2.9	3.0	3.4	
Interest rate on loans to households for house purchases (%)	1.3	2.0	1.4	1.5	2.1	2.9	2.9	3.1	
Deposits									
On demand deposits	12.6	6.2	9.1	7.7	6.3	1.8	1.9	0.0	
Other short-term deposits	-0.8	4.5	-0.3	0.9	5.3	11.9	11.9	14.0	
Marketable instruments	11.6	3.6	0.7	2.0	4.3	7.6	8.5	11.3	
Interest rate on deposits up to 1 year from households (%)	0.2	0.5	0.2	0.2	0.4	1.1	1.1	1.3	

Notes: 1. Weighted by flow of foreign trade. Higher figures indicate the currency has appreciated. 2. Data adjusted for sales and securitization. 3. Including NPISH. 4. Loans of more than one million euros with a floating rate and an initial rate fixation period of up to one year. 5. Loans with a floating rate and an initial rate fixation period of up to one year.

Source: BPI Research, based on data from the Eurostat, European Central Bank, European Commission, national statistics institutes and Markit.

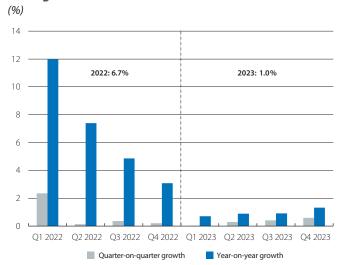


2022 brilliant, 2023 with some pitfalls

Economy avoids contraction in 4Q and advances 6.7% in 2022. In Q4 2022, GDP grew by 0.2% guarter-on-guarter and 3.1% year-on-year, a deceleration compared to the previous quarter, as a result of weaker performance in consumption, investment and exports. Preliminary data for the last quarter of the year show that Portuguese GDP is 3.2% above the 2019 level (2.3% in the Eurozone as a whole). Meanwhile, indicators for the new year are still very scarce, being practically limited to the assessment of economic sentiment in January. This first month of the year brought an improvement in confidence in all sectors. Among consumers, confidence recovered to levels similar to those of September 2022, essentially reflecting a more positive assessment of the economic situation in the country expected for the next 12 months and the prospects for carrying out important purchases, also in the next 12 months. The improved sentiment in the remaining sectors - industry, construction, trade and services - translated into an improvement in the economic climate indicator to 1.6%, up 3 tenths from a month ago. The former, associated with more benign behaviour of energy prices and greater resilience of the Euro Zone economy - where Portugal's main trading partners are located - suggest that the Portuguese economy may avoid a contraction of activity in Q1 2023. For 2023 as a whole, we expect the Portuguese economy to advance by 1%, a significant deceleration from growth in the last two years, which will largely reflect a correction from the impact of the pandemic on activity in 2020-21, also reflecting the full impact of rising interest rates in the Eurozone and the cumulative loss of purchasing power. The macroeconomic scenario is still full of uncertainty, but the risks for 2023 seem to be balanced.

Inflation decelerates sharply in January 2023. An INE quick estimate points to a year-on-year figure of 8.3% in the overall CPI, confirming the decline for the third consecutive month. This data is even more powerful when one considers that the underlying inflation rate fell for the first time, from 7.3% to 7%, after 15 consecutive months of increases. Behind this decline is the very sharp monthly decline in the prices of energy products (-9.1%), led by electricity; but the underlying component also retreated compared to December (-0.3%). The exception was unprocessed food products, with a strong monthly increase of 1.37%. Year-on-year changes in industrial producer prices registered a sharp deceleration in the last months of 2022, although still remaining at high rates. Normally there is some lag between the movements of these prices and the CPI, but this trend should already be contributing to the easing of consumer prices. In short, our view is that, given the high headline rate and greater persistence of the core component, the decline in inflation as





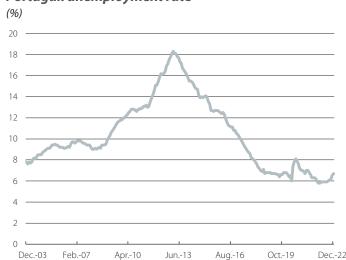
Source: BPI Research, based on data from the National Statistics Institute of Portugal and internal forecasts.

Portugal: CPI and Industrial Price Index



Source: BPI Research, based on data from the National Statistics Institute of Portugal.

Portugal: unemployment rate *



Note: * Seasonally-adjusted data.

Source: BPI Research, based on data from the National Statistics Institute of Portugal.



a whole will be slow and prolonged over time, and we will still close the year with year-on-year rates close to 3%.

The unemployment rate increased for the second consecutive month in December. More specifically, it reached 6.7% (seasonally adjusted), an increase of 0.2 pp compared to the previous month and an increase of 0.8 pp compared to the same month last year. The unemployment rate thus reached its highest level since June 2021 and approached the levels recorded in 2019. In turn, the employed population fell in year-on-year terms (-0.5%) for the first time since the beginning of 2021, still remaining clearly above pre-pandemic levels and maintaining records close to the maximum recorded in February. Registered unemployment also points to a reversal in the labour market at the end of the year, with growth for the fifth consecutive month in December (+10,282 unemployed), still remaining at comparatively low levels (around 307,000 unemployed). This behaviour is in line with that anticipated by BPI Research for Q4, with the unemployment rate expected to have averaged 6.0% in 2022.

Trade balance ends 2022 with a deficit close to 13% of GDP.

The first estimate for the trade balance in Q4 indicates that imports and exports of goods grew by 17.1% and 16% year-on-year, respectively. If this data is confirmed, the trade balance deficit will be around 30 billion euros, 55% more than a year ago, putting the trade deficit at levels identical to those observed in 2009. But despite this negative evolution in nominal terms, a look at the behaviour of imported and exported quantities suggests a less negative scenario. Up to November, the total quantity exported was 1.6% lower than in the same period last year, largely due to the drop in fuel sales abroad, most likely driven by increased sales to the domestic market in an environment of higher prices. Excluding fuel, exported quantities increased by around 6.5% and imported quantities by 4%.

The budget balance improved considerably in 2022. More specifically, and according to our estimate for GDP, the budget deficit will have stood at 1.5% of GDP (-4.0% in 2021). This improvement was due to the significant growth in revenue (11.1%), exceeding the Government's latest estimate (included in the 2023 State Budget) by 62 million euros (and by 720 million euros compared to the 2022 State Budget). This growth was mainly due to tax revenue. In turn, expenditure increased by 5.1%, surpassing the latest Government estimate by around 997 million euros, due to the implementation of additional support measures to deal with the increase in inflation and energy prices. However, expenditure was below that outlined in the 2022 State Budget (-880 million euros), highlighting the overestimation of public investment (execution was 2.4 billion euros below the 2022 State Budget). The execution in public accounting allows some conclusions to be drawn about the budget balance in national accounting, even though this change is marked by significant uncertainty.

Exported and imported quantities (thousands of tons)

60.000 50.000 39% 33% 40.000 30.000 20.000 67% 85% 79% 78% 10,000 0 2019 2022 2019 2021 2021 2022 Exports Imports

Source: BPI Research, based on data from the INE (National Institute of Statistics).

Budget Execution of the Public Administration (Main headings)

Non-fuels

Fuel

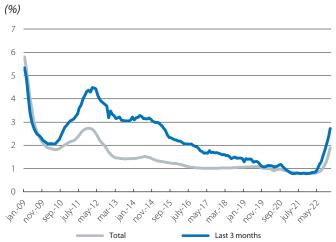
January-December (% GDP)	2019	2020	2021	2022	Var. 2022 2019	Var. 2022 vs. 2021 (millions euros)
Revenue	41.6	41.9	42.9	42.9	1.4	10,197
Tax revenue	24.2	24.3	24.0	24.6	0.4	7,110
Contributions Social Sec.	10.5	11.2	11.3	11.1	0.7	2,252
Expenditure	41.8	47.7	46.9	44.5	2.6	5,144
Expenses on staff	10.1	11.2	11.0	10.2	0.1	771
Current transfers	17.9	20.9	20.4	19.7	1.8	3,076
Acquisition of goods and services	6.2	6.7	6.9	6.8	0.6	1,343
Interest	3.8	3.8	3.2	2.8	-1.0	-380
Investment	2.3	2.6	3.0	2.8	0.6	314
Budget balance	-0.3	-5.8	-4.0	-1.5	-1,2	5,052

Source: BPI Research, based on data from the Directorate-General for the Budget.

The portfolio of credit to the non-financial private sector decelerated at the end of 2022. Specifically, it increased by 1.4% year-on-year in December, compared to growth of around 3% at the beginning of the year. On the one hand, the loan portfolio to non-financial companies fell 1.0% year-on-year, which should be related to the start of the amortisation of the COVID credit lines. On the other hand, the performance of the mortgage loan portfolio was noteworthy, with a clear slowdown in the second half of the year (2.7% year-on-year, compared to 3.8% in June). There are still no data for new home loan operations in December, but it is known that the number of bank assessments fell for the seventh consecutive month (-20.2% year-on-year). The sharp increase in interest rates, together with high inflation, general uncertainty and

house prices at significant highs will be restricting new mortgage loans. In fact, the interest rate implicit in home loan contracts (information provided by INE) increased by around 1.1 pp year-on-year in December to 1.898% (the highest level since September 2012), an increase of up to 1.9 p.p. in contracts entered into in the last 3 months (2.715%, the maximum since May 2015). With this increase, the portion of the monthly instalment relating to interest payments reached October 2012 levels (around 33%).

Implicit interest rate in home loan contracts *



Note: * Includes contracts for construction, acquisition and rehabilitation.

Source: BPI Research based on data from INE.



Without the ECB, how will Portugal finance itself in 2023?

Rampant inflation in the Eurozone has forced the ECB to act aggressively: in addition to raising interest rates by 250 bp in 2022, the central bank announced that it would stop buying debt under the Asset Purchase Programme (APP) from July 2022 and that from March 2023 it would reduce reinvestments by around €15bn on average per month in Q2. With Portugal's public debt ratio (still) high, a restrictive monetary policy revives fears of an increase in the cost of financing the State.

An overview of Portuguese public debt

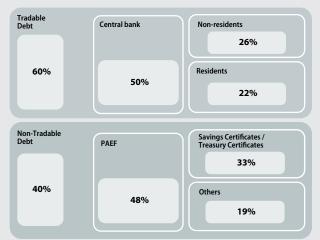
A high public debt ratio implies greater responsibilities for future generations and higher interest expenses, financial resources that could have been allocated to other purposes (e.g. improving public services). It is also important to bear in mind that higher interest charges imply that: i) the State has to raise revenue (usually through the collection of additional taxes); ii) cut other expenses (which may affect relevant areas of the public service, such as Health); or iii) a combination of the two.

Portugal had the third highest public debt ratio in 2021 (125.5%), above the EU and Euro Zone average (87.9% and 95.4%, respectively). This situation puts the country on the radar of rating agencies and international investors. In fact, despite the recent upward revisions of the rating by Fitch and S&P, these agencies do not rule out a downgrade triggered by the public accounts. Fitch, for example, reveals that a possible economic shock contributing to a reversal of the trajectory of public debt and a deterioration of the outlook for public accounts in the medium term are factors that may lead to a downgrade of Portugal's rating. It should be borne in mind that Portugal's worsening cost of financing also affects families and businesses, as was visible in previous financial crises. In addition, a higher rating means that the agencies assess the country's credit risk more favourably, with positive implications for the demand for Portuguese debt and for investor diversification, contributing to lower financing costs.

The State uses various instruments to finance debt.¹ The main instruments are Treasury Bonds (TBs) (representing 58% of direct debt, up from 43% in 2014) and official loans (20%, up from 36% in 2014, due to the repayment of the loan to the IMF). In turn, retail instruments have gained weight recently (around 12%, higher than the 8% recorded in 2014), in line with the recent run on Saving Certificates (SC) (outstanding balance increased by

1. In the analysis of public debt instruments and holders, we have opted to analyse the direct debt of the State, information disclosed by the IGCP, as it gives a more concrete idea of the weight of the central bank (national and ECB) in the public debt. Other available data do not allow withdrawing the ECB from debt to non-residents.

Direct State debt by holder



Source: BPI Research based on data from IGCP.

around 5.2 billion euros from the end of 2021 until November), stimulated by the recent rise in Euribor.

And who owns the Portuguese public debt? Of the total direct tradable public debt (which represents just over 60% of total debt), the central bank (ECB and Banco de Portugal) holds around half, which compares with a much less notable weight at the end of 2014 (13%). This is followed by non-residents, with around 26% (44% in 2014), and residents (financial institutions, excluding Banco de Portugal), which hold around 22% (compared to 43% at the end of 2014). Of the non-tradable debt, official loans granted under the Economic and Financial Assistance Programme (about 48% of the non-tradable debt), and the SC and TC, which together represent about 33% of the non-tradable debt, stand out.

What to expect for public debt in 2023?

The government anticipates that the public debt ratio will decline from 115% of GDP in 2022 to 110.8% in 2023, which, if confirmed, will be the lowest ratio since 2010 (when it reached 96.4%).² Similarly, for this year, a slight increase in the state's gross borrowing requirements is projected, from €23.7 in 2022 to €23.9 billion in 2023, around 10% of GDP (see table). This worsening is justified by the increase in the State deficit on public accounts and the net acquisition of financial assets.³ To this we must add the amortisation of medium and long-term debt that will fall due in 2023.

2. It is important to realise that the (a) increase (decrease) in public debt is not explained (a) only by the budget deficit (surplus). There are other factors that affect public debt that are not reflected in the budget balance (deficit-debt adjustment), which, in 2021, was responsible for around 40% of the reduction in the public debt ratio.



To meet these financing needs, the State will finance itself on the financial markets (with issues of 19.8 billion euros of TBs and other medium and long term debt, and net issues of 4.3 billion BT), from the EU (0.3 billion euros) and from retailers (through SC and TC). The State intends to finance itself in an amount greater than its funding needs, as it intends to allocate €2 billion in deposits, thus increasing the Treasury's financial cushion in 2023 (from €5.9 billion to €8 billion in 2023), possibly reflecting the uncertain context in which we live (in geopolitical and economic terms).

The State will have to go to the market to refinance the debt that will mature in 2023; according to the IGCP, the total amount (between TB, BT and official loans) should be around 19.5 billion euros, more than 7% of the State's debt (excluding retail products, such as SC and TC), and has a weighted average interest rate (coupon) of 3.9%. Despite the expected increase in the cost of financing in 2023, we estimate that the weighted average interest rate of this refinancing may stay below 3.5%, i.e., even so, and despite the context, the Portuguese State should be able to refinance the maturing debt at a slightly lower cost than the maturing debt.

However, one of the main supports for the low cost of financing in Portugal in recent years was the action of the ECB. With the withdrawal of the central bank, what impact will this have on Portugal? We estimate that the ECB will stop reinvesting around €3.6 billion of Portuguese public debt for the year as a whole, which represents around 6.7% of the debt held by the ECB. Looking again at the borrowing needs of the Portuguese State for 2023, we come to the conclusion that the net borrowing needs of ECB intervention correspond to an amount practically similar to that of 2022, that is, slightly above 20 billion euros (around 8% of GDP).

In conclusion, it seems to us that the worsening of financing conditions in Europe will affect the cost of financing the Portuguese State, but these costs should remain contained in 2023. Even so, this deterioration will obviously have an impact on interest charges, which will have an increasing weight in total public expenditure and as a percentage of GDP over the next few years.

Vânia Duarte

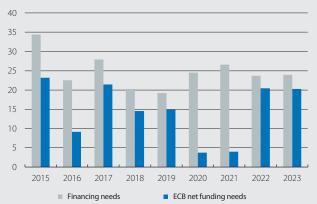
Financing needs of the Portuguese State

	2021	2022	2023
Net borrowing of the State	13.8	8.3	12.4
Budget Deficit *	9.5	5.3	5.9
Net acquisition of financial assets	4.3	3.0	6.4
Medium/long term amortisation and depreciation	12.9	15.4	11.5
OT+MTN	9.4	11.4	10.0
OTRV	3.5	3.5	_
Official loans	_	0.5	1.5
Gross public borrowing requirements	26.7	23.7	23.9

Note: * State deficit in public accounting. Source: BPI Research based on data from IGCP. **Source:** BPI Research based on data from IGCP.

Financing needs with and without ECB support

(Billions of euros)



Source: BPI Research based on data from IGCP and BCE.

^{3.} According to the CFP, the net acquisition of financial assets is influenced by: Repayment of medium and long-term loans by Autonomous Services and Funds (3.9 billion euros); Medium and long-term loans to Metro do Porto (2.4 billion euros); Capital allocations to Infraestruturas de Portugal (1.7 billion euros) and CP (1.9 billion euros). For more information, see ECB (2022). "Análise da proposta de Orçamento de Estado para 2023".



Portugal's macro scenario: key takeaways

The last time we changed the economic outlook for Portugal was in September. Since then, some hypotheses have changed. Specifically, European economies have shown considerable resilience, having avoided a downturn in activity in Q4 2022; energy prices (oil and gas) dropped substantially because of a mild winter and the positive results achieved by coordinated energy policies (among other factors); however, inflation has shown some resistance to this decline, particularly the most persistent (core) components, and production chains are still experiencing some pressure. Short-term interest rates will rise more than we initially forecast (we now expect the 12-month Euribor to reach 3.6% on average instead of 2.7% in 2023). This justifies a slight adjustment to our scenario, whilst maintaining the main trends, as described below. The main variables (and changes) in our scenario are summarised in the table.

Data for the last quarter of 2022 indicates quarter-on-quarter growth of 0.2% in economic activity. As in the rest of the Eurozone, performance was better than had been forecast at the start of the quarter. Household consumption (which accounts for more than 60% of GDP) continues to be supported by car sales and ATM withdrawals and payments; flight data suggests continued momentum in the tourism industry; as do revenue levels in industry and services. Confidence has also been improving since the end of the year across most economic agents and sectors.

Added to these signs is the reduction in the price of some raw materials,¹ namely energy, which is largely due to the accumulation of reserves to cope with winter (which is late in Europe) and to the signs that the Eurozone's reliance on Russian gas has decreased; support also comes from the greater resilience of some Eurozone data, such as the composite PMI, which has improved significantly since October.

However, although signs have become less negative, the outlook for 2023 is still defined by restrictive demand factors. A significant slowdown in consumption is to be expected as a result of the large and rapid increase in interest rates (above what we previously expected) and continued high-level inflation; the labour market will become weaker, but will continue to be an important support for families. Meanwhile, investment will grow less than would have been expected with financing from

Portugal - main macro variables scenario

		2021	2022	2023
GDP	BPI Jan23	5.5	6.7	1.0
(annual, %)	BPI Dec22	5.5	6.3	0.5
Rate of unemploy- ment	BPI Jan23	6.6	6.0	6.4
(annual average, %)	BPI Dec22	6.6	5.9	6.4
Inflation	BPI Jan23	1.3	7.8	5.5
(annual average, %)	BPI Dec22	1.3	7.9	5.7
Public deficit	BPI Jan23	-2.9	-1,1	-0.9
(annual, % of GDP)	BPI Dec22	-2.9	-1.5	-1.3
Public debt	BPI Jan23	125.5	114.3	109.7
(annual, % of GDP)	BPI Dec22	125.5	115.6	113.4
Current account balance	BPI Jan23	-1,1	-1.5	-1
(annual, % of GDP)	BPI Dec22	-1,1	-1.5	-1
Current and capital account balance	BPI Jan23	0.6	-0.7	1.3
(annual, % of GDP)	BPI Dec22	0.6	-0.7	1.3

Source: BPI Research based on own forecasts.

European funds, and this is also as a result of the increase in financing costs. The economic contribution of external demand should also decline, with exports reflecting less demand from main partners.

Based on this data, we have now revised our growth forecast to 1% in 2023.

Inflation is expected to decelerate in 2023, but will still remain high. The decline in the price of energy goods will bring some relief, but it will not prevent the prices of other goods from continuing to reflect either the persistence of supply constraints, as is the case of foodstuffs, or the continued inclusion of higher production costs in the final price of other products. In this scenario, it is highly likely that inflation will remain above 5%, which is lower than it was in 2022, but still well above the ECB's 2% target.

The performance in public finances has been very positive, which shows the government is taking action to prevent Portugal from receiving a negative risk assessment, avoid unwanted increases in risk premiums for Portuguese public debt and avert higher costs for financing Portuguese companies. Budgetary policy will continue to be prudent, which is why we expect further improvements in the deficit and public debt ratio, albeit at a slower pace, in line with the increased weight of debt service and constraints to revenue growth in view of the expected slowdown in economic activity.

Finally, external accounts returned to negative territory. Portugal once again had to resort to external financing as a result of the rise in the cost of imports (particularly energy), on which the country is still very dependent

^{1.} In view of recent developments in oil and gas prices, we have revised our price forecasts for 2023 downwards. We revised the average price of oil in 2023 to around 85 Dollars per barrel, which is 10 Dollars less than in the previous forecast; and we revised gas prices to around €110/MWh, which is significantly below the previous €200/MWh.

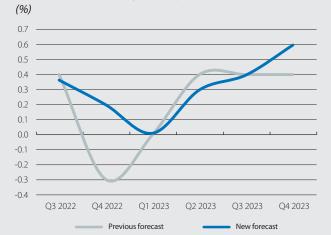
MR02

(despite the improvements that we have discussed in previous articles).² We expect this situation to be remedied in 2023 and for Portugal's external balance to return to positive territory (current account plus capital account) as the capital account balance improves due to financing from European funds. However, the current account will remain in negative territory, which reinforces the view that very specific steps are still needed to strengthen the nation's productivity and ability to compete abroad.

As has been the case in recent years, the macroeconomic scenario is highly uncertain and 2023 is no different. Risks seem to be balanced at present; however, there is a feeling that something could go wrong (again). Will the current cold wave in Europe last longer, putting pressure on prices? Will China's opening be reflected in a rise in energy prices? In this scenario, pressure on prices would increase and inflation would be higher; the central bank would be more restrictive, which would further limit consumption and investment. Let's hope not.

Teresa Gil Pinheiro

Portugal: Quarterly GDP growth



Source: BPI Research based on data from INE.

^{2.} For more details, see "External debt: on the right path, but in need of stable reduction factors», in IM01/2023.



Activity and employment indicators

Year-on-year change (%), unless otherwise specified

	2021	2022	Q1 2022	Q2 2022	Q3 2022	Q4 2022	11/22	12/22	01/23
Coincident economic activity index	3.5	6.4	7.3	7.0	6.0	5.5	5.5	5.5	
Industry									
Industrial production index	4.5	0.5	-2.1	2.0	1.8	0.1	-0.2	2.5	
Confidence indicator in industry (value)	-5.3	-3.4	-0.1	-2.3	-4.7	-6.6	-6.6	-6.9	-6.3
Construction									
Building permits - new housing (number of homes)	13.5		46.0	-22.6	4.3		0.2		
House sales	20.5		25.8	4.5	-2.8		_	_	_
House prices (euro / m² - valuation)	8.6	13.8	11.5	14.2	15.8	13.6	13.9	13.5	
Services									
Foreign tourists (cumulative over 12 months)	51.5	158.5	259.9	298.1	244.4	158.5	169.6	158.5	
Confidence indicator in services (value)	0.1	15.0	13.0	21.1	17.9	8.1	7.6	5.8	6.1
Consumption									
Retail sales	4.9	4.8	12.7	3.1	3.3	0.0	-1.7	0.5	
Coincident indicator for private consumption	4.9	4.6	7.0	5.6	3.5	2.3	2.2	2.1	
Consumer confidence index (value)	-17.2	-29.7	-19.3	-30.5	-31.8	-37.0	-37.7	-38.1	-37.0
Labour market									
Employment	2.8		4.7	1.9	1.1		0.4	-0.5	
Unemployment rate (% labour force)	6.6		5.9	5.7	5.8		6.5	6.7	
GDP	5.5	6.7	12.0	7.4	4.9	3.1	_	_	_

Prices

Year-on-year change (%), unless otherwise specified

	2021	2022	Q1 2022	Q2 2022	Q3 2022	Q4 2022	11/22	12/22	01/23
General	1.3	7.8	4.3	8.0	9.1	9.9	9.9	9.6	8.3
Core	0.8	5.6	3.1	5.5	6.5	7.2	7.2	7.3	7.0

Foreign sector

Cumulative balance over the last 12 months in billions of euros, unless otherwise specified

	2021	2022	Q1 2022	Q2 2022	Q3 2022	Q4 2022	11/22	12/22	01/23
Trade of goods									
Exports (year-on-year change, cumulative over 12 months)	18.3		21.2	18.9	22.7		24.5		
Imports (year-on-year change, cumulative over 12 months)	22.0		33.3	31.5	35.1		33.8		
Current balance	-2.5		-4.3	-4.7	-4.3		-4.1		
Goods and services	-5.7		-6.9	-6.4	-5.1		-5.1		
Primary and secondary income	3.2		2.7	1.7	0.8		1.1		
Net lending (+) / borrowing (–) capacity	1.2		-0.8	-1.3	-2.1		-1.7		

Credit and deposits in non-financial sectors

Year-on-year change (%), unless otherwise specified

<u> </u>									
	2021	2022	Q1 2022	Q2 2022	Q3 2022	Q4 2022	11/22	12/22	01/23
Deposits ¹									
Household and company deposits	9.3	6.4	8.9	8.2	7.8	6.4	6.5	6.4	
Sight and savings	16.3	7.3	15.3	12.9	11.2	7.3	7.3	7.3	
Term and notice	1.2	5.2	1.1	2.3	3.3	5.2	5.4	5.2	
General government deposits	-4.1	12.4	9.8	8.5	-0.1	12.4	10.7	12.4	
TOTAL	9.0	6.5	8.9	8.2	7.5	6.5	6.6	6.5	
Outstanding balance of credit 1									
Private sector	2.9	1.4	2.8	2.5	1.9	1.4	1.4	1.4	
Non-financial firms	2.2	-1.0	1.2	0.7	-0.5	-1.0	-1.1	-1.0	
Households - housing	3.3	2.7	3.0	3.8	3.3	2.7	3.0	2.7	
Households - other purposes	3.1	2.9	6.4	3.3	3.2	2.9	2.8	2.9	
General government	3.8	-2.7	5.3	-1.3	-1.5	-2.7	-0.2	-2.7	
TOTAL	2.9	1.2	2.8	2.4	1.7	1.2	1.4	1.2	
NPL ratio (%) ²	3.7		3.6	3.4	3.2		_	_	-

Notes: 1. Residents in Portugal. The credit variables exclude securitisations. 2. Period-end figure. **Source:** BPI Research, based on data from the National Statistics Institute of Portugal, Bank of Portugal and Refinitiv.



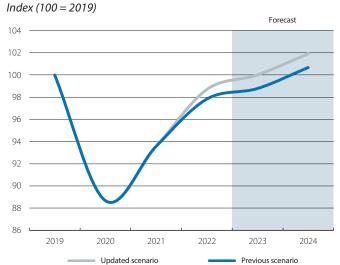
The outlook for Spain improves slightly, but remains highly challenging

The Spanish economy is proving more resilient than expected, almost a year into the energy crisis. Whereas in December 2021 our GDP growth forecast for 2022 was 5.9%, in March, after the outbreak of the war between Russia and Ukraine, we lowered this forecast to 4.2%. In the end, the economy has managed to grow by a significant 5.5%, in spite of the geopolitical conflict, rising inflation and tightening macroeconomic conditions. In the coming quarters, the Spanish economy will continue to face an adverse context, marked by geopolitical uncertainty and rising interest rates. However, there are also some elements that will support economic growth, such as the acceleration of the disbursement of the NGEU funds and the recovery of the sectors hardest hit by the pandemic, such as tourism. Inflation, while remaining high, is likely to moderate somewhat faster than expected thanks to the fall in energy prices. All this, together with the better-than-expected performance of the economy in the final stages of 2022, has led us to revise our forecast for GDP growth in 2023 slightly upwards, from 1.0% to 1.3%.

GDP closed the year with positive growth, but domestic demand was very weak in the final weeks. Following the sharp rise in energy prices in August, the forecasts according to the consensus of analysts in September suggested that GDP would register a decline in Q4 2022. This has not been the case, and GDP grew by 0.2% quarter-on-quarter (2.7% year-on-year). However, the composition of growth, according to preliminary data from the National Statistics Institute, shows a weakening of domestic demand. It fell by 0.9% quarter-on-quarter, as a result of the contraction of private consumption (–1.8% quarter-on-quarter) and investment (–3.8% quarter-on-quarter). Thus, GDP growth came from the contribution of external demand due to the fall in imports (–4.2% quarter-on-quarter), which were dragged down by weak domestic demand and far exceeded the decline in exports (–1.1%).

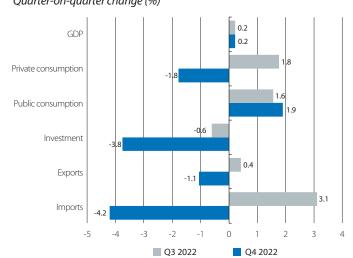
Job growth slowed in the last quarter of 2022. Employment according to the labour force survey (LFS) remained flat, in seasonally adjusted terms, in the closing stages of 2022. In non-seasonally adjusted terms, employment fell by 81,900 people, marking the first decline in a Q4 since 2017. On the upside, the temporary employment rate fell to 17.9%, which is the lowest in the historical series and 7.5 pps less than the figure recorded in Q4 2021. Finally, the unemployment rate crept up to 12.9% from 12.7% in Q3, 0.4 percentage points below the level at the end of 2021. The annual average for the unemployment rate in 2022 stood at 12.9%, compared to 14.8% in 2021.

Spain: GDP



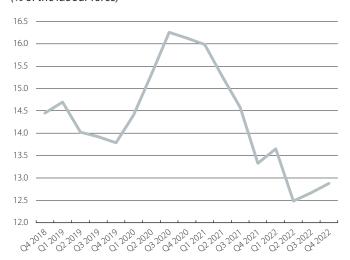
Source: BPI Research, based on data from CaixaBank.

Spain: components of GDPQuarter-on-quarter change (%)



Source: BPI Research, based on data from the National Statistics Institute.

Spain: unemployment rate (% of the labour force)



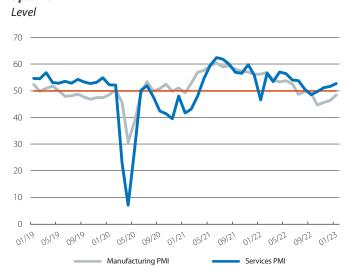
Source: BPI Research, based on data from the National Statistics Institute

The signals from the first available economic activity indicators of 2023 look hopeful. In January, the PMI for the manufacturing sector rose 2 points to 48.4 points. While still below the threshold that denotes growth (50), this nevertheless suggests that the deterioration in industrial activity is moderating. Also, the counterpart indicator for the services sector climbed by 1.1 points to 52.7 points, placing it firmly in expansionary territory. The Social Security affiliation data, meanwhile, indicates that the year began better than expected. Although the number of registered workers fell, as is usual in the month of January, in seasonally adjusted terms employment grew by 57,726 people, representing an increase of 0.4% compared to the Q4 2022 average. Furthermore, on the consumer side, the CaixaBank Research consumption tracker reveals that the usage of Spanish bank cards in January continued the recovery begun in December, registering 10% year-on-year growth in January, up from 8% in December and 5% in November.

Core inflation continues to climb, while headline inflation stabilises. Headline inflation cut short its recent trend of moderation and stood at 5.8% in January, 1 percentage point above the figure for December. In contrast, core inflation (which excludes energy and unprocessed foods) jumped by 5 percentage points up to 7.5%, despite the VAT cut on some foods. As advanced by the National Statistics Institute, the slight rebound in headline inflation in January is explained by the rise in fuel prices, after the end of the 20-cent-per-litre discount on fuel for all users, as well as a smaller reduction in clothing and footwear prices than in the sales of January last year. However, these dynamics were practically offset by the significant fall in electricity prices. In fact, according to data from Spain's electricity grid operator Red Eléctrica Española, the regulated tariff stood at €129/MWh on average in January, which represents a sharp year-on-year drop of 55%. The National Statistics Institute also announced that, beginning this January, the electricity and natural gas components of the CPI will include free market data in their computation. With the inclusion of this data, energy price dynamics are likely to be somewhat more stable, as free market prices tend to fluctuate less.

Marked improvement in the non-energy trade balance. In November, the foreign trade deficit stood at 3,313 million euros, a figure below that of the same month of the previous year (4,207 million), thus truncating the deterioration seen in recent months. This improvement came from the balance of non-energy goods, which registered a surplus of 990 million euros compared to a deficit of 1,199 million in November 2021, driven by an increase in exports (4.5% year-on-year in terms of volume) and a fall in imports (–3.5% by volume). The energy deficit, meanwhile, continued to grow and reached 4,303 million, 1.4 times higher than a year ago, due to the sharp increase in imports (+38.7%) as a result of the rise in prices (+31.7%).

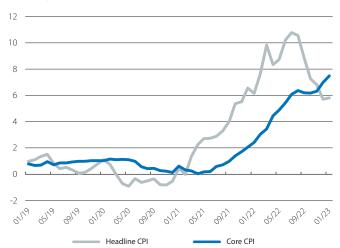




Source: BPI Research, based on data from Markit

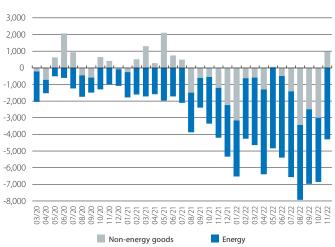
Spain: CPI

Year-on-year change (%)



Source: BPI Research, based on data from the National Statistics Institute

Spain: balance of foreign trade in goods (EUR millions) *



Note: * Monthly data.

Source: BPI Research, based on data from the Department of Customs



Spanish households' savings and financial wealth on the decline

The rise in inflation caused a fall in the savings rate in Q3 2022

In Q3 2022 there was a sharp fall in the household savings rate. It should be recalled that even in the first two quarters of 2022, Spanish households had continued to save more than prior to the pandemic. Specifically, in Q1 the savings rate (as a percentage of gross disposable income, or GDI) in seasonally adjusted terms was 10.1% and in Q2, 8.4%, both figures above the 6.7% recorded on average between 2015 and 2019. However, in Q3 2022 we did see a considerable fall in the savings rate to 5.7% in seasonally adjusted terms, marking the lowest figure since Q3 2018.

Faced with rising inflation, households reduced their savings in order to sustain their consumption levels. Specifically, the increase in household consumption in real terms was 1.4% year-on-year, which represents a significant slowdown compared to the 3.4% recorded in Q2. However, in nominal terms consumption growth was 12%, a figure far higher than the increase in gross disposable income, which was 1.6%.¹

Looking at the composition of GDI, the buoyancy of the labour market was the main driver of its growth (wage earners' compensation grew by 5.8% year-on-year in Q3), but this was greatly mitigated by the negative contribution of taxes (see second chart). This explains why primary gross income (income before taxes and benefits) increased well above total gross income (5.1% year-on-year in the case of primary income versus 1.6% for total income).

The average savings rate for 2022 is expected to be slightly above 6.0%, well below the 13.7% of 2021. Looking ahead, all the indicators suggest that in 2023 the household savings rate will continue to gradually reduce due to the impact of inflation, albeit more gently than in 2022. Not surprisingly, we expect nominal consumption to grow by more than 5% in 2023. This is a difficult pace for GDI to match in a context in which the somewhat more dynamic wage growth and the 8.5% pension rise will be partially mitigated by higher interest payments following the rise in the Euribor. Thus, we expect the savings rate in 2023 to be well below the average for 2015-2019, which was the aforementioned 6.7%.

1. According to the non-financial accounts, including households and non-profit institutions.

Spain: household savings rate

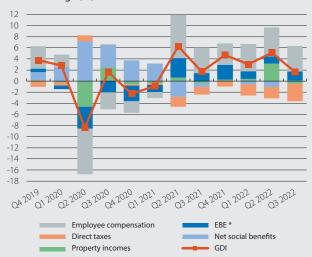
(% of gross disposable income)



Source: BPI Research, based on data from the National Statistics Institute.

Spain: household gross disposable income (GDI)

Annual change (%) and contributions



Note: * Gross operating surplus: encompasses incomes – not strictly wages – generated for households through their participation in the production process in their capacity as producers. **Source:** BPI Research. based on data from the National Statistics Institute.

Households reduced their debt, but their financial wealth also fell

Was the decline in the savings rate reflected in households' financial assets? The answer is yes. Not in vain, the net acquisition of financial assets in Q3 was –27,800 million euros; that is, there was a net sale of assets. This is a usual occurrence in any Q3, although in this case the amount exceeds the pre-pandemic figures (average of –23,546 million in 2015-2019). This «de-accumulation» affected all classes of financial assets,

2. Holdings in insurance policies and pension funds also suffered a net divestment of –2,061 million.

particularly equities and investment funds, with around 5,600 million euros sold, marking the largest volume in Q3 of any year since 2013.² In contrast, households reduced their bank deposits by 1,219 million, a limited sum compared to the average of –8,145 million in Q3 in the years 2015-2019.

This net sale of financial assets was exacerbated by a devaluation effect amounting to 25,500 million euros³ due to the fall in prices in the financial markets. As a result of these two factors, the stock of households' financial assets fell by 53,431 million euros (-2%), the biggest drop since Q1 2020, to 2.6 trillion euros; in terms of GDI, this amount represents 324%, the lowest level in two years. Thus, the stock of financial assets has continued to lose value and, as a proportion of GDI, has dropped to 17.5 pps below the peak reached in Q4 2021 and just 11 points above the pre-COVID level. In real terms, the stock of financial assets has reduced since the end of 2019, as it has increased by 7.1% in nominal terms while cumulative inflation in the same period has amounted to 11.7%.

As for the structure of households' financial wealth, the trend of recent years is accentuated: bank deposits remain the main asset class and have even increased their share to 38.5% of the total, 7 percentage points more than in the previous quarter and 3 points above the levels of Q4 2019. On the other hand, insurance policies and pension funds have lost prominence, representing 12.7% of the total, 3 points less than at the end of 2019. Equities and investment funds, meanwhile, stabilised at around 43% of the total.

As for the net liabilities incurred, households repaid debt in the quarter (bank loans) worth 9,846 million euros, although it is still too early to declare that we are witnessing a pattern of early repayments in the face of the interest rate rises, since this is a seasonal phenomenon and the amount is only slightly higher than the average for 2015-2019 (–9,311 million).⁴ Consequently, the deleveraging of households is intensifying: in Q3 2022 the debt balance fell by 10,000 million euros to a total of 707,528 million (–1.4%), representing 87.5% of GDI (89.1% in Q2), the lowest ratio since the close of 2003.

Given that the stock of households' financial assets fell more sharply than that of their liabilities, their net financial wealth continued to trend downwards and fell

Spain: financial balance of households (% of GDI)



Source: BPI Research, based on data from the Bank of Spain.

Spain: structure of households' financial wealth

(% of the total)



Source: BPI Research, based on data from the Bank of Spain.

almost 6 points to 229.9% of GDI, the lowest level since Q3 2020.

In any case, in comparison with the crisis of 2008-2013, households today are in a better financial position to successfully deal with the weakening of economic activity, both in terms of their wealth and their indebtedness, which at that time (Q4 2008) stood at 252.3% and 132.5% of GDI, respectively.

^{3.} The loss of value in equities and investment funds was particularly pronounced (–16,371 million), in line with the decline in stock prices, insurance policies and pension funds (–10,500 million).

^{4.} In four-quarter cumulative terms, lending remains positive and is even accelerating (7,624 million vs. 6,870 million in 2021 as a whole).



Activity and employment indicators

Year-on-year change (%), unless otherwise specified

	2021	2022	Q1 2022	Q2 2022	Q3 2022	Q4 2022	11/22	12/22	01/23
Industry									
Industrial production index	8.8	_	1.6	4.5	4.6	-	-1.1		
Indicator of confidence in industry (value)	0.6	-0.9	6.8	0.5	-5.2	-5.4	-7.6	-4.8	-3.9
Manufacturing PMI (value)	57.0	51.0	55.8	53.2	49.2	45.6	45.7	46.4	48.4
Construction									
Building permits (cumulative over 12 months)	4.7	_	31.6	18.8	8.8	-	3.5		
House sales (cumulative over 12 months)	9.6	-	41.8	33.6	23.0	-	18.0		
House prices	3.7	8.1	8.5	8.0	7.6		_	-	_
Services									
Foreign tourists (cumulative over 12 months)	64.7	129.5	313.4	311.7	208.4	129.5	143.7	129.5	
Services PMI (value)	55.0	52.5	52.2	55.9	51.0	50.8	51.2	51.6	
Consumption									
Retail sales	5.1	0.8	0.3	1.2	0.1	1.7	-0.5	4.0	
Car registrations	158.0	-3.0	-7.5	-10.3	3.1	2.6	10.3	-14.1	51.4
Consumer confidence index (value)	-12.9	-26.5	-18.2	-26.8	-32.6	-28.2	-28.1	-25.3	-23.0
Labour market									
Employment ¹	3.0	3.1	4.6	4.0	2.6	1.4	_	-	_
Unemployment rate (% labour force)	14.8	12.9	13.6	12.5	12.7	12.9	-	_	-
Registered as employed with Social Security ²	2.5	3.9	4.5	4.8	3.5	2.7	2.7	2.4	2.3
GDP	5.5	5.5	6.9	7.8	4.8	2.7	-	_	-

Prices

Year-on-year change (%), unless otherwise specified

	2021	2022	Q1 2022	Q2 2022	Q3 2022	Q4 2022	11/22	12/22	01/23
General	3.1	8.4	7.9	9.1	10.1	6.6	6.8	5.7	5.8
Core	0.8	5.1	3.0	4.9	6.2	6.5	6.3	7.0	7.5

Foreign sector

Cumulative balance over the last 12 months in billions of euros, unless otherwise specified

	2021	2022	Q1 2022	Q2 2022	Q3 2022	Q4 2022	11/22	12/22	01/23
Trade of goods									
Exports (year-on-year change, cumulative over 12 months)	21.2	_	26.2	22.2	23.3	_	23.4		
Imports (year-on-year change, cumulative over 12 months)	24.8	_	36.1	35.2	38.1	_	36.0		
Current balance	11.5	-	8.5	8.5	7.0	_	10.2		
Goods and services	17.9	_	14.2	15.3	15.7	_	19.8		
Primary and secondary income	-6.4	_	-5.7	-6.8	-8.7	_	-9.6		
Net lending (+) / borrowing (–) capacity	22.4	_	19.8	21.5	19.8	_	23.3		

Credit and deposits in non-financial sectors³

Year-on-year change (%), unless otherwise specified

, , , , , , , , , , , , , , , , , , , ,									
	2021	2022	Q1 2022	Q2 2022	Q3 2022	Q4 2022	11/22	12/22	01/23
Deposits									
Household and company deposits	6.1	4.9	5.2	5.4	5.3	3.6	3.7	2.9	
Sight and savings	10.3	7.9	9.3	9.2	8.2	5.0	5.2	3.6	
Term and notice	-24.4	-19.9	-26.8	-25.4	-19.2	-8.3	-8.6	-4.8	
General government deposits	15.5	9.3	19.3	15.6	6.6	-4.2	-6.7	-4.0	
TOTAL	6.7	5.1	6.0	6.0	5.4	3.0	2.9	2.4	
Outstanding balance of credit									
Private sector	0.3	0.7	0.2	0.8	1.3	0.4	0.7	-0.5	
Non-financial firms	1.1	0.9	-0.5	0.7	2.4	0.8	1.3	-0.9	
Households - housing	0.2	1.0	1.3	1.4	1.1	0.2	0.2	-0.2	
Households - other purposes	-1.2	-0.7	-1.1	-0.5	-0.9	-0.2	0.2	-0.2	
General government	15.3	0.1	3.4	1.9	-3.5	-1.1	-0.9	0.5	
TOTAL	1.1	0.6	0.4	0.9	1.0	0.3	0.5	-0.4	
NPL ratio (%) ⁴	4.3	_	4.3	4.1	3.8		3.7		

Notes: 1. Estimate based on the Active Population Survey. 2. Average monthly figures. 3. Aggregate figures for the Spanish banking sector and residents in Spain. 4. Period-end figure. **Source:** BPI Research, based on data from the Ministry of Economy, the Ministry of Public Works, the Ministry of Employment and Social Security, the National Statistics Institute, the State Employment Service, Markit, the European Commission, the Department of Customs and Special Taxes and the Bank of Spain.



Will inflation come down? The key trends for 2023

The saying goes that better the devil you know than the devil you don't, but perhaps inflation is a special case. An old acquaintance of economists, it did not present figures like those of 2022 since the beginning of the 1980s. In other words, up until 2021 around

45% of the European population had never lived with such high inflation, and just 30% had seen it in adulthood. In fact, in the last decade inflation gave cause for concern due to its weakness. However, following the pandemic and the invasion of Ukraine, inflation has quickly made up for the lost ground: whereas in late 2019 the euro area price index (HICP) was 7% lower than it should have been based on the target inflation of 2%,¹ the sharp rally in prices since then has caused the HICP to virtually close this gap entirely by the end of 2022. What will happen in 2023?

The Big Bang of inflation

The forces that triggered inflation to rise are global, somewhat unpredictable and exogenous. Above all, the pandemic caused significant imbalances between supply and demand by generating disruptions in global supply chains, blocking the consumption of services and redirecting much of the demand towards goods. Thus, bottlenecks emerged and inflation began to pick up, driven by goods, a rise in food prices and a rebound effect in energy prices (which had initially plummeted with the outbreak of the pandemic). Later, the lifting of restrictions also led to higher prices in services, as their activity normalised.

Energy: contribution to headline inflation



Notes: From January 2023 onwards, the solid lines show the estimated contribution of the energy component according to our oil and gas price forecasts. The dashed lines correspond to a more severe scenario (the upper line, with gas prices similar to those of October 2022 and oil accelerating to 110 dollars) and a more favourable scenario (the lower line, with gas prices according to the futures of January 2023 and oil at around 75 dollars).

Source: BPI Research, own estimates based on data from Eurostat, the Bureau of Labor Statistics and Bloomberg.

The mismatches between supply and demand that were caused by the pandemic ought to have a temporary effect on inflation and, in the absence of second-round effects, dissipate as economies normalise. In fact, the bottlenecks have been gradually clearing and, according to various indicators, since the autumn of 2022 they have been relatively limited and will help to curb inflation in 2023, although it is difficult to specify at what speed (transmission between bottlenecks and consumer prices occurred rapidly in 2021, but the historical evidence suggests that there may be lags of up to a year).²

Before this normalisation could materialise, the invasion of Ukraine added more fuel to inflation, exerting unprecedented pressure on energy prices and accentuating the rise in food prices.³ The price movements have been so abrupt (energy surged by over 40% year-on-year in the major advanced economies) that, through its pressure on production costs, the rise in energy prices has passed-through to many components of the consumer index: for instance, in the euro area it is estimated that the «energy-sensitive» components have added more than 2 pps to the inflation of services and around 3 pps to that of goods (approximately 50% of the observed inflation in both cases).⁴

All in all, the virulence of 2022 will, almost mechanically, have a downward effect on 2023. On the one hand, it should be taken into account that in 2022 as a whole, oil and gas − two of the major determinants of energy prices − surged by 60% (Brent) and 180% (TTF). A repeat of these figures in 2023 would result in extreme prices: oil at 130 dollars and gas at €320/MWh. But the dynamics of recent months have been the opposite: prices have stabilised and the forecasts (both those of analysts and market futures) suggest they will remain below those of 2022. Thus, in the absence of extreme scenarios, the significant, direct and positive contribution from energy should be rapidly diluted (see first chart). On the other hand, food is being affected by second-round effects (the rise in the price of food itself, energy and other inputs) and the projections do not point to a moderation until mid-to-late 2023.

Finally, both the pandemic and the Russian invasion triggered the implementation of fiscal support measures to cushion the impact of the crises on household incomes. During the pandemic, the measures were particularly substantial in the US, and it is estimated that they contributed significantly to the rise in inflation.⁷ In Europe, meanwhile, the support measures in response to the energy

- 1. i.e. If prices had grown by 2% per year since the beginning of 2013 (which was when the sustained weakness in inflation began).
- 2. See O. Celasun *et al.* (2022). «Supply Bottlenecks: Where, Why, How Much, and What Next?». International Monetary Fund.
- 3. See the Focus «The impact of higher agricultural commodity prices on emerging and low-income countries» in the MR12/2022.
- 4. See P. Lane (2022). «Inflation Diagnostics». The ECB Blog.
- 5. The chart projects the contribution of energy inflation in 2023 based on its historical relationship with oil and gas prices. We consider three scenarios: (i) our own energy forecasts, (ii) stressed prices (gas at October 2022 levels and oil accelerating up to 110 dollars) and (iii) relaxed prices (gas according to January 2023 futures and oil at around 75 dollars).
- 6. ECB (2022). December 2022 macroeconomic projections.
- 7. See F. De Soyres, A.M. Santacreu and H. Young (2022). «Fiscal policy and excess inflation during Covid-19: a cross-country view». FEDS Notes. Washington: Board of Governors of the Federal Reserve System, 15 July 2022.



crisis stand out: it is estimated that they slowed inflation by just over 1 pp in 2022 and that they will continue to deduct 0.5 pps in 2023 (consequently, their withdrawal in 2024 will likely push up prices due to a base effect).⁸

Second-round effects through wages

This year, in addition, the central banks will have their sights set on one of the main determinants of inflation in the medium term: wages. In theory, when wage rises outpace productivity growth, this generates inflation because of the higher costs that companies must bear. Rapid wage rises also stimulate the aggregate demand for goods and services, which in turn tends to put further pressure on prices. The data for 2022 have shown us that wages in the US have registered rapid growth, rising by over 5% year-on-year, while in the euro area these rates have not been much higher than the historical average (2.4%).

While it may still be too early to tell, in the US a slight slowdown in wages has already begun, so it appears that second-round effects

US and euro area: wages

Year-on-year change (%)



Note: For the US we show the evolution of hourly wages, while for the euro area we show wages negotiated in labour agreements.

Source: BPI Research, based on data from the ECB and the Bureau of Labor Statistics.

ought not be a problem in 2023. Wage growth in the euro area had a very low starting point, but it is gradually rising. Indeed, it is plausible that pressures in the labour market to minimise workers' loss of purchasing power could lead to higher than usual wage rises in 2023. To quantify the impact that wages could have on inflation in the coming quarters, we identified the components of the core consumer basket that have historically been sensitive to wage increases: 30% in the euro area and over 50% in the US.⁹

Components of the core consumer basket sensitive to wages



Notes: We consider that a component is sensitive to wages if, in the ordinary least squares regression of its price evolution versus the contemporary wages and their lag, any of the coefficients is positive and significant with a 95% confidence interval. For the euro area, we used the sample from 2001 to 2019 and for the US, from 2012 to 2019. * Instead of using the entire sample, we performed the same regression with a five-year rolling window which we shift over time, allowing a component to be sensitive to inflation in some periods and not in others.

Source: BPI Research, based on data from Eurostat and the Bureau of Labor Statistics

This figure provides a measure of the risk of second-round effects. In other words, if wage growth becomes more dynamic in the euro area, we know that 30% of the core consumer basket will tend to increase as well. However, there are several arguments that qualify this possible risk. The first is that there are still no significant wage pressures in the euro area. In fact, wages are growing well below inflation and the signs of acceleration are contained. The second is that if, in this illustrative exercise, we allow the components to switch between being sensitive and non-sensitive over time,¹⁰ we see how the relative weight of the sensitive components has decreased in the euro area since the outbreak of the pandemic (see third chart). The third argument is that in the US, an economy where wages have already accelerated sharply and where the structure of the consumer basket of goods is somewhat more susceptible to second-round effects, the contribution of the components of core inflation that are sensitive to wage rises has remained at around the historical average. In fact, in the US the main component that is driving up core inflation, and which is sensitive to wages, is shelter which accounts for more than 40% of the core index and is rising at a year-on-year rate of 7%. The inflation of this component is expected to remain high in the first half of 2023 due to the inertia it usually shows, although it could begin to moderate in the second half of the year.

In short, this outlook for inflation moderating in 2023 – to below 4% at the end of the year in the euro area and the US – supports our view that the cycle of rate hikes by the central banks should end before this summer (indeed, before the spring in the case of the Fed). However, both the Fed and the ECB will want to maintain a restrictive stance for a while to ensure that it returns to the 2% target rate – a task which will not be easy due to the inertia that core inflation looks likely to show.

^{8.} ECB, op. cit.

^{9.} Specifically, we used an ordinary least squares regression for each component of core inflation (excluding energy and food) against the contemporary wages and those of the previous quarter. We consider a component to be sensitive to wages if any of the wage coefficients or their lag is positive and significant with a 95% confidence interval.

^{10.} Instead of using the entire sample (from 2001 to 2019) we perform the same regression with a five-year rolling window which we shift over time, allowing a component to be sensitive to inflation in some periods and not in others, under the same conditions as explained in the previous note.



What will happen to inflation in the long term? A global perspective

Beyond the inflation outlook for this year, to complete the narrative it is important to have a structural vision of where inflation will lie in the long term in advanced economies and what determining factors we will have to pay special attention to. In the end, the question is where inflation will lie when the cycle that began with COVID-19, and which has continued with the war in Ukraine, comes to an end and what will happen with inflation targets.

US and euro area: 3-year consumer inflation expectations



Notes: Median of these expectations. Data for the US available up to December 2022 and for the euro area up to November 2022.

Source: BPI Research, based on data from the New York Federal Reserve's Survey of Consumer Expectations and the ECB's Consumer Expectations Survey (CES).

In order for inflation to return to close to 2.0% in the medium term, which is the target rate of most of the central banks, it will be essential to anchor economic agents' expectations at around this level. In other words, they must be prevented from thinking we are entering a world in which inflation will be persistently above the target rate. According to the ECB's analysis, European consumers' inflation expectations for three years into the future have risen from 2.0% to almost 3.0% in just one year (see first chart). This is no small increase and we will have to wait and see if it is consolidated or ends up unwinding. The credibility of the central bank and its policies to avoid second-round effects will be key. With a long-term perspective, which is the focus of this article, factors such as the energy transition, the evolution of globalisation and migratory flows will play a fundamental role in inflation dynamics.

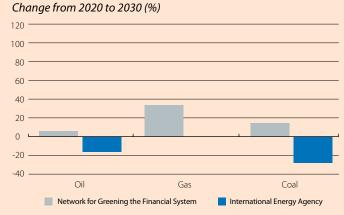
In advanced economies, the impact that the energy transition will have on aggregate prices is uncertain, as there are various opposing forces operating in fossil fuel prices. On the supply side, regulatory uncertainty could reduce the supply of these fuels, which would lead to higher prices. On the other hand, the front-loading of production

due to the worsening expectations, coupled with the emergence of technological innovations (carbon capture and improvements in carbon storage, etc.), would reduce prices. On the demand side, the factors that would lead to a reduction in fossil fuel prices seem to dominate: preferences for clean energies and increased investment in green energy would reduce the demand for fossil fuels and, consequently, their prices. However, the impact that the introduction of a carbon tax would have is uncertain, as although demand and thus the pre-tax price would be reduced, depending on the tax rate the post-tax price could potentially be higher.²

In any case, the studies conducted to date show that, even if an ambitious energy transition takes place between now and 2030 (see second chart), the increase in the price of fossil fuels would be contained (6% for oil and 30% for gas on a cumulative basis over the period 2020-2030, according to the Network for Greening the Financial System).

However, if an ambitious energy transition aimed at limiting temperature rises to 1.5 degrees above pre-industrial levels were to be successfully carried out, there is broad consensus that the impact ought to be disinflationary. Not surprisingly, in 2022 the marginal cost of producing solar energy already accounted for a quarter of the marginal cost of gas-based power plants in Europe, according to the International Energy Agency. The greater the deployment of renewables, the quicker this price reduction impact will occur and the sooner we will reach the «divine coincidence» – an expression coined by ECB Executive Board member Fabio Panetta to refer to a world with greener and cheaper energy. On the other hand, an unambitious energy transition would entail inflationary pressures due to a greater role of fossil fuels (to which

International price of fossil fuels in 2030 in an ambitious energy transition *



Note: * The temperature increase is limited to 1.5 degrees compared to pre-industrial levels and 0 emissions are achieved in 2050. Calculated on the basis of pre-tax prices in dollars. **Source:** Panetta, F. Greener and cheaper: could the transition away from fossil fuels generate a divine coincidence? ECB speech, November 2022.

we should add the economic costs of the greater recurrence of natural disasters and extreme weather events).

^{1.} In November, there was already an incipient downward shift.

^{2.} However, an IMF study based on the gradual introduction of a carbon tax aimed at cutting emissions by 25% by 2030, and with a 20-pp increase in the relative weight of renewables in the energy mix, shows a very moderate increase in inflation in 2030 in the euro area, amounting to 0.2 pps at the most. Indeed, it would be almost negligible if a portion of the proceeds from this tax were dedicated to providing green subsidies to the main productive sectors. See chapter 3 of the autumn 2022 WEO.

^{3.} See the speech by Fabio Panetta in November 2022, Greener and cheaper: could the transition away from fossil fuels generate a divine coincidence?

As for globalisation, it can be said that from a theoretical point of view it has had a disinflationary impact on advanced economies in recent decades. Firstly, since advanced economies have to compete with the lower prices of emerging economies, the increased trade flows reduce both imported and domestic inflation, as domestic producers are forced to improve their efficiency because of the greater competition. Secondly, digitalisation and the greater availability of information have reinforced globalisation by creating a single global market with very low search costs, resulting in lower prices. Thirdly, the fragmentation of production in the major global production chains has led emerging economies with lower costs to specialise in the production of key intermediate goods for the production of consumer goods. The third chart of this article shows that as globalisation progressed in the late 20th century, the impact of domestic wage growth on core inflation in the US decreased.

However, when we analyse the relationship between globalisation and inflation in more detail, and taking into account cause-effect relationships, we see that there is indeed an impact, but

US: globalisation and the impact of wages on inflation



Note: Regression coefficients for core inflation and wage growth delayed one month beginning in 1970 with a rolling window of the previous 10 years. This coefficient is interpreted as the average increase in core inflation over the past 10 years if there is a 1-pp increase in year-on-year wage growth in the previous month. The higher the globalisation index, the higher the level of globalisation. **Source:** BPI Research, based on data from Bloomberg and the Swiss Economic Institute.

it is small.⁴ Globalisation has reduced inflation in goods, but not in services – this is logical, since they are less tradable. For example, the greater availability of information has made it possible to bring down the price of goods (as they are more homogeneous and comparable than services), but not the price of services.⁵ Furthermore, it seems that other forces have been more decisive than globalisation in explaining the fall in inflation in the decades leading up to the conflict in Ukraine: globalisation accelerated between the end of the 20th century and 2010, whereas the sharp drop in global inflation occurred between 1980 and 1997. This was a period in which central banks became independent and set inflation targets, but in which globalisation was not yet at its height (China joined the WTO in 2001, marking its peak).⁶

Today, we find ourselves at a fork in the road as we rethink globalisation. The health emergency revealed the importance of not relying on key inputs manufactured in third countries, and this is beginning to lead to a restructuring of global supply chains due to the need to diversify suppliers. In addition to the need for supply security, other factors at play include the reindustrialisation of advanced economies for the green and digital age, the technological competition between the US and China with the establishment of barriers to technological access, and the debate around the implementation of carbon reduction mechanisms in developed economies in order to be on an equal footing with emerging economies which are not taxed for their emissions. Even if this process were to lead to gradual deglobalisation, the inflationary pressures associated with this process should be moderate given that the impact of globalisation on prices has not been very significant in magnitude.

Finally, we cannot end this article without mentioning migratory flows. We are entering a world with renewed protectionist impulses: COVID-19 caused a reduction in migratory flows due to health reasons and it seems that a trend of tougher migratory policies may be consolidated. A prime example of this is the US. Before COVID-19, when the unemployment rate was falling, there used to be greater immigration by workers to fill low-skilled jobs, but this practice has now ceased. In fact, a recent study documents that for these jobs there is a very low degree of substitution between immigrant workers and native workers, so the former are essential in order to fill them. Thus, if these trends of migratory restrictions are consolidated, there would be upward wage pressures in these low-skilled occupations.

In short, in a more protectionist world with greater global fragmentation and stricter migration controls, an energy transition that is smart, well-designed and involves powerful investments in clean technologies will be key, as will be a monetary policy that has a clear objective and is well communicated in order to keep inflation at reasonable levels and in line with central bank targets.

^{4.} See M.G. Attinasi and M. Balatti (2021). «Globalisation and its implications for inflation in advanced economies». ECB Economic Bulletin Articles, 4.

^{5.} According to the authors of the study mentioned in note 4, more research will be needed to understand the differences in the behaviour of goods and services. The increased transparency of the internet reduces search costs and accentuates competition in the goods market, where products are more comparable and homogeneous, in contrast with the services sector. Globalisation also pushes up the price of services through another channel, namely global value chains: services are regarded as the «glue» and the catalyst for complex supply chains. It is therefore plausible that the services sector's value added and trading margins are positively correlated with a wider use of global value chains.

^{6.} Global inflation fell by 6.9 points between 1981 and 1997 and only by 1.8 points between 1998 and 2010. In contrast, the KOF Globalisation Index increased by 16.5% between 1981 and 1997 and by 19.5% between 1998 and 2010.

^{7.} Comparing similar companies that had access to migrant workers in low-skilled jobs in the US visa draw versus those that did not, it is found that, on average, companies which had to reduce the hiring of migrant workers by 50% experienced an 18% drop in their production and did not hire any additional native workers for those positions. See M.A. Clemens and E.G. Lewis (2022). «The Effect of Low-Skill Immigration Restrictions on US Firms and Workers: Evidence from a Randomized Lottery». NBER Working Paper 30589.

^{8.} This remains to be seen. In fact, climate change could lead to significant migrations due to natural disasters.



Inflation dynamics for Portugal in 2023

As inflation was one of the dominant economic issues of 2022, it is important to look at how prices developed in Portugal over the course of the year. To do so, in this first article we focus on three central aspects of this discussion: energy, food and (the possibility of) second-order effects.

The impact of energy on the CPI

Changes in the prices of energy raw materials directly or indirectly impact on the production costs of all sectors and, consequently, on the prices charged to consumers. In order to assess this impact, we estimated how production costs would have changed, assuming that energy costs were passed on in full. In this scenario, production costs would have increased by around 10% between 2020 and 2022, with the weight of energy costs on production increasing from 8% to 17%.

Then, we isolated the impact of the increase in energy costs on the average annual inflation rate ¹ and concluded that if in 2021 the change only reflected the performance of energy prices, the annual inflation rate would have been 2 tenths higher than it actually was and that in 2022 the inflation rate would have been 6.9%, which is 9 tenths less than it was. Thus, the strong rise in inflation in 2022, which was higher than it would have been if the CPI had only reflected the increase in energy prices, is explained by the presence of other factors, such as the rise in

How inflation evolved and what it would have looked like if it only reflected changes in energy costs



Source: BPI Research, based on data from the National Institute for Statistics and Bloomberg.

the price of other imported goods, the increase in food prices, bottlenecks in global production chains and higher freight costs, and the strong increase in demand, particularly consumption, which took advantage of the full opening up of activities and the existence of excess savings accumulated in the pandemic years.

In 2023, the scenario for energy goods prices is a downward correction of around 15%, which will alleviate inflationary pressures, but will not prevent inflation from remaining high, as how prices perform will essentially reflect how the rise in the cost of raw materials and energy affects other types of goods and services. This knock-on effect, which had already been observed in 2022, explains the greater pressure on underlying inflation as, although global inflation already shows some signs of deceleration, this pressure will remain throughout much of 2023.

Upward pressure on food prices is expected to continue

The evolution of food product prices is of particular importance, not only because it is the component with the greatest weight in the CPI basket (over 20%), but also because it includes products with an important relative weight for lower-income families. In addition, these products are very important for shaping consumer expectations about future inflation. In 2022, this component registered average inflation of 12.9%, which is well above global inflation (7.8%), but what can we expect these prices to do in 2023? Data from the food price index prepared by the FAO, which in 2022 was very similar to that of the Portuguese food price index, shows some easing of prices in recent months (prices declined between June and December 2022). However, this has not happened in Portugal: the food products and non-alcoholic beverages category has experienced quarter-on-quarter increases over the last 15 months. We believe that the risks associated with supply and possible supply constraints (due to the ongoing war in Ukraine) and the increase in transport, logistics and personnel costs are still being passed on to consumers.

2022 was also the hottest year in Portugal since 1931, which had a negative impact on agricultural activity. Both plant and livestock production registered a decline in volume, which is summarised in the second graph.⁴ While Portugal usually has self-sufficiency levels of above 100% in some products (wine and olive oil, for example), this decline in agricultural and livestock production, which is likely to be repeated in the coming years due to the impact of climate change, will increase the nation's dependence on other countries for some products (such as cereals), meaning that it will have to import them at higher costs. Furthermore, as these products meet basic needs, demand for them is relatively inflexible. Therefore, our outlook for 2023 is still for high pressure on food prices.

^{1.} In 2021 and 2022, the inflation rate for energy products was 7.3% and 23.7%, respectively. The forecast for 2023 is for a slowdown to 6.3%.

^{2.} See D'Acunto, F., Malmendier, U., Ospina, J., and Weber, M., "Exposure to Grocery Prices and Inflation Expectations" (2020). Chicago Booth Research Paper No. 19-17.

^{3.} Food and Agriculture Organization of the United Nations.

^{4.} The exception was cattle production, albeit for a peculiar reason: the scarcity of pastures due to the drought and the increase in the price of animal feed caused a rise in prices and producers took advantage of this to increase the number of animals slaughtered and reduce staff and related expenses.



Wage increases and possible second-order effects

Finally, we must also discuss what are usually called "second-order effects". These effects are primarily associated with wage increases. This is where a rise in prices initially triggered by a shock in the energy markets (first-order effect) leads to demands for wage increases in step with inflation that may create a wage-price spiral (second-order effect), particularly when the expectation is that high inflation will persist. Recent research into this issue5 suggests that more recent energy shocks, for example, to the price of oil, have not generated a spiral of this kind in Europe: it is estimated that the response to increases of 10% in the prices of this *commodity* causes wages to increase on average by just another 0.3% over three years, which stabilises afterwards, and is therefore not the decisive factor that explains why inflation persists.

(%) 10 5 0 -5 -10 -15 -20 See and Porticulture sand Porticulture with Porticulture and Porticulture and Porticulture with Porticulture and Porticulture

Production volume variation in 2022

Source: BPI Research based on data from INE.

Data from the Portuguese labour market shows that6 in September 2022 wages grew by 3.9% year-on-year (and 2.9% on average over the last 12 months), which is well below a year-on-year inflation rate of 9.3% (6% annual average) and core inflation of 6.9% for the same period. The exception are sectors such as "Consulting, scientific, technical and similar activities", which in September showed year-on-year growth in wages of 6.8%, but which represent only 5% of employment. However, we know that most wage updates are carried out in the first four months of the year, so it is important to monitor data over the coming months. There are already some certainties for Portugal in 2023: the minimum wage will increase by 7.8% (which is equal to average inflation for 2022), while public sector employees will get a wage

CPI and average monthly gross remunera

Year-on-year change (%)



Source: BPI Research based on data from INE.

increase of Euros 52 euros to approximately Euros 2,600 euros a month (above this wage bracket, the increase will be 2%). In the private sector, updates will depend on company decisions or collective bargaining agreements, so they will differ from case to case; however, the agreement⁷ signed in October by the government and its social partners sets a target of a 5.1% increase in 2023. Despite the labour market being "tighter", that is, with low unemployment and a high number of vacancies to be filled (which translates into greater bargaining power for workers), the economic slowdown expected for 2023 together with the decisive actions of the ECB should act as forces to anchor inflation expectations and avoid second-order effects.

Tiago Belejo Correia and Teresa Gil Pinheiro

^{5.} See Baba, C. and Lee, L. (2022), «Second-round effects of oil price shocks», IMF Working paper. In this study the authors use quarterly data from 24 European OECD countries since 1960 to estimate the transfer of increases in oil prices to wages.

^{6.} Average monthly gross remuneration per worker.

^{7.} Medium-term agreement on improving incomes, wages and competitiveness (9 October 2022).

^{8.} In terms of the private sector, the annual study by the consultancy Mercer for Portugal «Total Compensation 2022», released in September 2022 and which covered 527 companies and more than 160 thousand jobs, should also be highlighted. In this study, the average forecast for wage increases in 2023 (2.8%) is just slightly above what was forecast in the same 2021 study for increases in 2022 (2.3%).



Imported inflation in Portugal: characterisation and recent performance

Imported inflation is the result of an increase in the price of imports. Importing inflation leads to an increase in the production costs of domestic companies, which often *pass through* this increase in costs to the price of the goods and services they sell. Thus, imported inflation is ultimately reflected in the benchmark used to measure the evolution of prices in a country: the

Consumer Price Index. In this article we intend to highlight how import prices have evolved by type of product, the contribution of each type of product to the global increase in import prices, and its recent dynamics.

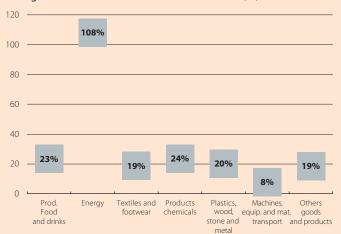
We used INE's monthly data on import amounts and quantities to calculate weights in the import basket and price changes for different types of goods¹ in order to construct an import price index (IPI).² In the first graph, we can see that the annual rate of import prices peaked in March 2022, the month immediately after the start of the conflict in Ukraine. It can also be seen that, from the moment rates of increase in import prices reached positive ground (March 2021), they were much higher than the rates of increase in the CPI – the peak of the increase in import prices was 44%, while in the CPI it was 10.1%. It should be noted that import prices began to decelerate sharply from September onwards, while in the CPI

Source: BPI Research based on data from INE.

the first sign of deceleration was more modest and only occurred in November. This data suggests not only a certain time gap between changes in import prices and changes in consumer prices, but also that the magnitude of increases in import prices is

Imports inflation

Average rate of the 12 months until October 2022 (%)



Fonte: BPI Research, com base em dados do INE.

only partially transferred to consumer prices.³ Specifically, using the econometric analysis model, we estimated that increases of 10% in the IPI translate into an increase of 1.04% in the CPI with a time gap of four months.

But which products explain these high inflation rates on imports? To perform this analysis, we grouped imports into seven major product categories – Food products and beverages; Energy; Textiles and footwear; Chemicals, Plastics, wood, stone and metal; Machinery, equipment and transport equipment; and Other goods and products. The average inflation rate was very high in Energy (above 100%) and also above 20% in Food Products and Chemicals. The particular case of the energy crisis experienced in 2022 is well known, and this in itself would already explain the evolution of prices in this category. Exchange rates are a significant factor in imported inflation, particularly in energy: most transactions in these markets are made in dollars and the fact that the euro has depreciated against the dollar for a good part of 2022

makes the situation worse. It must also be noted that in these three categories of higher inflation Portugal is a net importer, which may show that greater external dependence also plays an important role here – the three categories (energy, food, and chemicals) represent 77% of the external balance of negative goods⁴ and in two of these categories (energy and chemicals), the

^{1.} Combined classification - NC8.

^{2.} The weight of each type of good in the index was calculated based on the average value of the imported good over the last 12 months compared to the total value of imports.

^{3.} On this subject see also Binici, M; Centorrino, S.; Cevik, S. and Gwon, G., «Here Comes the Change: The Role of Global and Domestic Factors in Post-Pandemic Inflation in Europe». IMF Working Paper No. 2022/241. This article states that global factors explain a very significant percentage of the inflation variance in advanced European countries. The so-called "global factors" include aspects that are directly associated with imports such as global prices for energy and other products, in addition to the global output gap, pressures on supply chains, etc.



value of imports is more than double the value of exports. We have already identified the categories of imported goods with the highest price increases, but given the weight that each of these categories of products has in the basket of imports, their contribution is also a determining factor in explaining the values of imported inflation. In the third graph, we can see that energy alone represents almost 60% of imported inflation⁵; however, another category, which is essentially a grouping of commodities (plastics, wood, stone and metal) also has a high weight of 21%. When we compare the contribution of the most volatile component (energy plus food products) to the CPI and the IPI throughout 2022, we find that it is high in both, but higher in import prices and more stable in consumer

Aggregate contribution of Energy and Prod. Food in the IPI and CPI



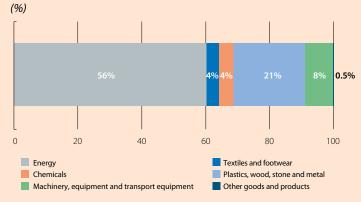
Source: BPI Research based on data from INE.

animal fats and oils). Despite this good news, 58% of the basket of imports still had inflation of between 10% and 30% in October 2022, which means that imported inflation will continue to exert pressure on consumer prices, albeit at a lower rate than last year.

In summary, we concluded that imported inflation had a notable impact on consumer prices in Portugal and that energy products were particularly affected by this in 2022, despite the latest data pointing to a slowdown.

Tiago Belejo Correia

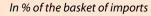
Contributions to the imported inflation rate

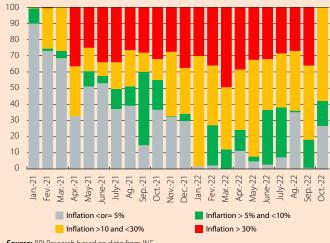


Source: BPI Research based on data from INE.

prices (see the fourth chart). We believe that this is explained by three factors. Firstly, the weight we estimated for energy in the imports basket is higher than the weight of energy in the CPI basket, which reflects a huge dependence in primary energy terms. Secondly, some measures of a fiscal nature also existed, for example in fuels, which mitigated energy price increases for the end consumer. Finally, the existence of a regulated electricity and gas market in Portugal, in addition to price setting mechanisms in the free market, with some disconnection from the wholesale market and the contribution of renewable energies. 6 What has caused imported inflation recently? To answer this question, we created an inflation traffic light (last graph) which shows that in the latest available data we no longer find any category with year-on-year inflation rates above 30%. This is mainly due to lower inflation in energy products, chemicals and other products in the food category (vegetable products and

Imported inflation traffic light





Source: BPI Research based on data from INE

^{4.} Difference between the sum of exports and the sum of imports from January to October 2022.

^{5.} These values refer to the average contribution of each category between January 2021 and October 2022.

^{6.} For this purpose, see the article «Inflation in Portugal: electricity-powered prices?» in IM12 of December 2021: https://www.bancobpi.pt/contentservice/ getContent?documentName=PR_WCS01_UCM01204680

All BPI studies and publications are available at: www.bancobpi.pt

MONTHLY REPORT

Analysis of the economic outlook for Portugal, Spain and at the international level, as well as the trends in financial markets, with specialized articles on topical subjects.

FLASH NOTES

Periodic analysis of relevant economic issues in the Portuguese economy (activity, prices, public accounts, external accounts, real estate market, banking sector) (only available in English).

COUNTRY OUTLOOK

Economic, financial and political characterization, of the main trading and investment partner countries of Portuguese companies. Brief analysis of the main economic and financial aspects and economic forecasts for the triennium.

Available in English: Mozambique Country Outlook



The Monthly Report is a publication drawn up jointly by CaixaBank Research and BPI Research (UEEF) which contains information and opinions from sources we consider to be reliable. This document is provided for information purposes only. Therefore, CaixaBank and BPI shall take no responsibility for however it might be used. The opinions and estimates are CaixaBank's and BPI's and may be subject to change without prior notice. The Monthly Report may be reproduced in part, provided that the source is adequately acknowledged and a copy is sent to the editor.

© Banco BPI, 2023

© CaixaBank, S.A., 2023

Design and production: www.cegeglobal.com



